#### INTERNATIONAL ECONOMICS



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To
Max Enke
and
June D. Salera



#### Preface

International Economics attempts to analyse foreign trade and finance in terms of the practices and theories of today. Even before the war, most books in this field devoted excessive space to a non-existent gold standard, to "classical" theories of foreign trade based on a discarded labor-theory of value, and to tariffs as a means of regulating trade. The present volume includes at least one chapter on each of these three subjects, but it treats of much else besides. The theoretical sections on national specialization and international equilibrium follow neo-Marshallian value principles, and modern analyses of the balance of payments, and include chapters on the trade multiplier and monopoly theories. The chapters on trade regulation feature import limitations by means of exchange control and quotas. In the final part, on international finance, the emphasis is on restricted currency areas, exchange stabilization funds, and the International Monetary Fund and Bank. The descriptive chapters also incorporate up-to-date material dealing with recent history and current problems.

The present book embraces more topics than can easily be covered in a single term of study. From the outset, certain chapters were planned to be "core chapters," and these are essential if the reader is to benefit from continuity and balance. The authors therefore recommend that Chapters 1, 3; 4, 6-9; 13-17, 23, 26; 27, 30, 32-35 be emphasized. The remaining chapters, comprising about forty per cent of the book, are supplementary. They may be included to suit the interests of the student of international economics, and as time permits. For a year's study, the entire book should prove adequate.

The two authors have attempted to combine the predomi-

X PREFACE

nantly theoretical interests of one with the Washington experience of the other. It is hoped that a diverse collaboration of this sort will make for a stronger treatment and a broader approach. Professor Enke wrote Part I and most of Part II, except Chapters 4, 8, and 9. Professor Salera wrote Part IV and most of Part III, except for Chapters 14, 15, 19, and 25, and also prepared the index. Each author gave the other advice and no effort was spared to effect a unified treatment of the whole.

Professor Salera wishes to express his appreciation to Dr. Arthur I. Bloomfield, of the Federal Reserve Bank of New York, who contributed a number of ideas incorporated in the present text; and also to June D. Salera, for her constant advice and counsel.

S. E.

V. S.

Los Angeles and Piedmont, California

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# PART I THE WORLD ECONOMY

#### Chapter 1

#### ational Welfare and Foreign Trade

#### The Economics of Frontiers

National boundaries have no commercial or financial importance in themselves, but are only material to economic life because governments have regulated goods, services, and monies in terms of these boundaries. National frontiers have thus been endowed with a significance that would be lacking under a regime approaching laissez faire. The incidental losses which usually result from converting boundaries into barriers are a real, but often justifiable, cost of government regulation.)

The natural irrelevance of national boundaries is apparent when one considers how often they run counter to the geographic facts upon which the division into economic regions is usually based. The frontier of the United States and Canada is a case in point. Here, geographic factors, such as topography and rainfall, establish economic boundaries that run north and south. The Maritime Provinces are akin to the New England States just as the prairie provinces of Canada are similar to the States of the Great Plains. However, the political frontier runs west and east, and has, by dint of government regulation, created national economic regions without root in geographic fact. In many ways such division into economic regions is unfortunate, as the benefits to be derived from economic intercourse are not conditioned upon the participants residing on the same side of a national boundary.

It is widely recognized that the extra productive efficiency, so often released by extreme specialization, would not be economically practicable but for the possibility of subsequent exchange. Consumers' needs are varied and become increasingly diverse as their plane of living rises. For example, the wisdom which prompts a producer to specialize in making butter is predicated on the expectation of his being able to exchange his tons of output, through the medium of money, for the foods, clothes, furnishings, and so on, desired by himself and his family. Productive specialization and sumptuary diversity are compatible only as exchange is facile. This principle does not cease to operate when a political frontier is reached. (It is true rather that tariffs, quotas, and other national obstructions impede exchange and contract the area over which exchange can be carried on; for this reason, tariffs and other national obstructions tend to prevent the realization of potential gains.)

The more direct advantages of exchange are simplest to comprehend in the case of barter. Smith has grown more oats than he needs, but is short of fertilizer. Jones is short of oats, but has more manure outside his barn than he can use. An exchange of oats for fertilizer will yield a gain to both traders. The reality of this gain is not altered by the fact that each farmer will probably sell, instead of trade, his surplus, and then use the money proceeds of this sale to purchase the things he needs. On the contrary, the existence of money, besides facilitating such trades, extends the area of exchange; and the benefits which are realized from trading a commodity surplus for a deficit are just as real when the exchange of goods is across a national boundary.

Little imagination is required to conceive of the sacrifices that would attend an extreme degree of self-sufficiency. The relatively high living standards in the United States are due in no small measure to the vast extent of the free-trade area which it constitutes. Suppose, however, that each of the forty-eight States were prevented from trading with one another! Only a few of the more densely populated States would have sufficient sales to maintain an automobile industry. The

people of New Jersey would suffer from a rather impoverished diet if it had to grow all its own food. Many States would lack fuel to work their factories, heat their buildings, and drive their vehicles. The people of Florida would come to loathe the sight of citrus fruits and would long for all the metal products which they could not make for themselves. People in the Pacific Northwest would have to revert to the timber-and-fish economy of the earlier Indian tribes. Part of the greatness of America depends upon the thoughtful prohibition by the Founding Fathers of obstructions to interstate commerce. However, the benefits of free trade are also realized when, instead of State boundaries, it is national frontiers that are ignored in trade.

Investment, like trade, should not be confined to a small area. Rational investment should benefit both lender and borrower. The lender gains because the rate of interest is higher than the rate of return that he could realize from additional funds employed in his own enterprises. The borrower gains because he can use extra capital in a way that will yield a rate of return superior to the interest rate that he must pay. This mutual benefit is not lessened when the lender and borrower reside in different nations. In fact, there is usually a wider disparity between the abundance and scarcity of capital funds amongst different countries than within a single nation. Consequently, unless any additional risks are unrewarded, international investment often affords a more attractive margin of gain than does the domestic variety.

Nothing would retard economic development more unjustly than the necessity of self-financing. What would be the situation of the United States today if each of the States had been forced to limit the pace of its industrial expansion to the rate at which it could save? The varied industries of California—petroleum, moving picture, synthetic rubber, and so on—would never have attained their present stage of development if they had not been financed by outside capital and the profits from state "exports." Similarly, Canada would

never have reached her present status without the aid of American and British capital. The situation is identical with Argentina, South Africa, Australia, and a host of other countries.

Under our type of economic system, general economic welfare is realized, except where one man's gain is another's loss, by thousands of individuals attending separately to their own personal well-being. The ways in which individuals improve their material lot through economic activity may give an insight into the advantages of foreign trade and investment. The enterpriser, wanting a market for his product, is perfectly willing that foreigners should eat the beef he raises or use the plumbing he makes; and as long as the price is "right" and the supply assured, the enterpriser is unconcerned about the national origin of the equipment and materials he employs. Nor do patriotic prejudices carry much weight in borrowing and lending. Companies, and even governments, are usually entirely willing to borrow from foreign nationals when in need; and especially when domestic investment opportunities are disappearing, are investors glad to lend abroad, assuming that any increase in risk is covered by the interest rate. Few people care whether or not the world is politically divisible when they can derive gain from economic transactions on an international scale. Only when businessmen or farmers are discomforted by foreign competition or when they cannot resist the temptation to seek a subsidy at consumer expense, do they form special interest groups, importune their governments, and assert that imports are injurious. However, except for the possibility of obtaining government aid by exercising organized pressure, farmers and businessmen would take no more account of political boundaries in their economic calculations than the existence of government restrictions would compel them to do. In this age of high-speed transportation and facile communication, the world clearly should work toward the progressive elimination of the economic barriers erected at national houndaries

#### National Specialization

#### Specialization and aptitude

(A country should specialize in the production of those things it can make most easily. Nations, no less than individuals, vary in aptitude to perform different jobs. It is only common sense to concentrate on producing those goods in which one's country has the most advantage and on exchanging the resultant surplus for those goods which the country cannot make so easily.)

Variations in national aptitude arise because all countries do not have the same climate, are not equally endowed with natural resources, and do not have similar labor. Thus; peculiarities of soil, temperature, and humidity are responsible for the advantages of French North Africa in wheat and of British Columbia in timber. The unique location of mineral deposits gives rise to gold exports from the Union of South Africa, nickel from Canada, and petroleum from Venezuela. However, a great deal of national specialization is due to labor being relatively cheap or expensive, or because land and capital funds are comparatively abundant or scarce.

Technological conditions for the production of some goods necessitate the use of much labor per unit of land (namely, rice cultivation) while other goods require relatively little labor and much land, as in the case of cattle raising. Certain processes, such as petroleum refining, require an enormous investment of capital relative to labor while other processes demand only unmechanized labor, as is illustrated by apple growing and apple picking. The principle of comparative advantage dictates that each country should specialize in those enterprises using most (relative to other enterprises) of the factors of production that are cheaper there (relative to other factors).

Some illustrations of this principle may prove helpful. "Young" countries (Australia, Argentina, or Chile), where agricultural land and minerals are abundant and cheap but

where labor is relatively scarce and expensive, will do best to specialize in farming the richest soil and working the purest ore deposits. Older countries, such as Belgium where the population is dense in relation to farm land and where capital and labor are abundant and cheap, will do best to specialize in manufactures and to import most of their food.

#### Trade gains and substitution costs

The principle of comparative advantage can be understood more exactly if it is stated with numerical precision.

Let us imagine that the United States, amongst all the products which it makes and grows, produces two items which we shall describe as cloth and cereals. Furthermore, we shall suppose that the cost of making additional supplies of cloth is \$2.70 a yard, whereas the cost of growing extra cereals is 90¢ a bushel.

Provided the employment level of all productive factors in the United States is constant for the moment, it is fairly obvious that more cloth can be made only if less cereals are grown, and conversely. Farm land and labor, which now grow cereals, would have to be converted to the raising of cotton and wool for making cloth, whereas the industrial materials and labor now making threshing machines would have to be converted to producing textile looms.

Specifically, how many bushels of cereals would have to be sacrificed in order to manufacture another yard of cloth? The answer is given by the cost data cited above. Extra yards of cloth cost \$2.70 each, and extra bushels of cereals cost 90¢ each. This monetary cost expresses the economic value of the productive factors that will have to be diverted from cereals to make an extra yard of cloth, or from cloth to grow an extra bushel of cereals. In terms of production, a yard of cloth is the equivalent of three bushels of cereals, and a bushel of cereals is the equivalent of one third of a yard of cloth. The substitution cost of cloth to cereals is as one is to three.

In some foreign country, which we shall call Alienland, the

technological problems of making cloth and raising cereals may be somewhat different. Perhaps Alienland is a socialistic state in which cost figures are kept in terms of labor hours rather than money outlays. Accordingly, their statisticians compute the cost of an extra yard of cloth at six man-hours, and the cost of an extra bushel of cereals as being three man-hours of standard labor. Then, following the same economic reasoning employed above, the substitution cost of cloth to cereals in Alienland is as one is to two.

A comparison of the United States and Alienland is now in order. In the United States, cloth is relatively expensive, and cereals are relatively cheap, but the reverse is true in Alienland. Mutually advantageous trade is possible if each country will specialize in the good it can make with the least comparative expense. The substitution costs in each country for each commodity are as follows:

	U. S.	Alienland
Substitution cost of 1 yard of cloth	3 bushels cereals	2 bushels cereals
Substitution cost of 1 bushel of cereals	1/2 yard cloth	½ yard cloth

Alienland has the least cereal cost in producing cloth and so should concentrate on textiles. The United States has the least cloth cost for cereals and so should specialize along this line. The two countries should then exchange surpluses.

The sharing of the trading gain between the two countries will depend upon the prices at which cereals are exported from the United States and clothing is exported from Alienland. Let us suppose that these prices are such that a yard of cloth is in effect being exchanged for two and a half bushels of cereals. The United States will then save half a bushel on every yard of cloth that it imports because she need only export two and a half bushels of wheat in exchange for cloth imports, whereas she would have to sacrifice the production of three bushels of wheat if she converted to increased cloth manufacturing. Alienland gains half a bushel of cereals on every yard of cloth

it exports because an exported yard of cloth brings back two and a half bushels of cereal imports, whereas a conversion of domestic production would only yield two bushels per yard of cutback in cloth production.

It cannot be overemphasized that trading gains are based on comparative advantage calculated in substitution costs. The situation as regards absolute advantage, measured perhaps in man-hours, is quite unimportant. In fact, the numerical example used above was deliberately arranged so that it is impossible, without additional data, to tell whether the United States has an absolute advantage or disadvantage in either cereals or cloth.

However, calculations regarding the absolute position of the United States would be possible if we knew the average hourly wage rate in America. If the rate were 50¢, the United States would appear to have an absolute advantage in both products, for this would reveal that a yard of cloth can be made with 5.4 man-hours (as against 6 in Alienland) and that a bushel of cereals can be raised with 1.8 man-hours (as against 3 in Alienland). However, the United States would be at a disadvantage in both lines of production if average wage rates were only 25¢ an hour. However, in either case the United States should specialize in cereals, Alienland in cloth, and the trading gains would be as indicated in the preceding paragraph. The absolute situation is immaterial; the comparative position determines what should be imported or exported.

#### Freight costs and trade barriers

(The economic benefits of specialization and trade are only gross gains until the costs of transferring goods from one country to another have been deducted. Sometimes freight costs and customs duties are so great as to destroy completely any latent advantages from specialization that might otherwise exist.) Reverting to the numerical example already employed, trade in cloth and cereals between the United States and Alienland could only be desirable if the total transfer

costs were less than the gross trading gain. Specifically, these costs, converted into a cereals equivalent, of transferring one yard of cloth and two and a half bushels of cereals, would have to be less than one bushel. Therefore, it is not surprising that, in view of the limiting effect of transportation and tariff expenses, many commodities fail to enter international trade even though they are produced under conditions of comparative advantage.

(The past hundred years have witnessed a phenomenal improvement in transportation and an equally astonishing reduction in its cost. Consequently, many goods which only offer a relatively small gross gain from international exchange, and which in the past were precluded from foreign trade, are now accepted articles of world commerce) Reductions in transportation cost have opened new areas to international trade and have rendered many countries less self-sufficient in the matter of foodstuffs. In the middle of the last century. railroads and canals enabled the cereal surpluses of Russia, Rumania, and Poland to penetrate the French, Austrian, and German markets. Toward the end of the century, however, industrial Europe began to receive its wheat from the west rather than the east, for the development of screw-driven steamships on the Atlantic Ocean and an expanding network of rail lines through the plains regions of North America brought a flood of Canadian and American wheat to the European continent. In the present century, ship refrigeration has rendered the cattle herds of Argentina a source of chilled meat for Europe, whereas during the past century, these same herds were valued only for dried beef, hides, fertilizer, and glue. Refrigeration has also brought butter and mutton from New Zealand to Great Britain. Today air transportation in northern Canada and Alaska is permitting the development of rich mineral deposits previously considered inaccessible. Improved transportation is reflected in the shifting pattern of trade statistics.

(The history of recent decades has shown that government

regulation is often a more insuperable obstacle to world trade than the expense of bridging physical distance.) The international merchant obtains a gross margin based on the difference between the price he pays in the exporting country and the price he receives in the importing nation. Freight costs may fall, but, if customs duties rise, the volume of trade may remain unchanged. In the past this has, in fact, occurred. Reductions in transportation expense, although serving as a stimulus to foreign trade of themselves, were nullified by rising tariff rates. In some extreme cases, mutually advantageous trade has been flatly prohibited by import embargos, quotas, and exchange restrictions.

### The Importance of Foreign Trade and Investment to the United States

Americans often fail to realize the importance of foreign investment and trade to the United States. Our nation is almost continental in scope, and we tend to be as self-sufficient as any other nation on earth. Accordingly, Congressmen and voters often develop the feeling that "foreign trade doesn't matter." Nothing could be further from the truth.

A cursory way of determining the quantitative importance of foreign trade is to express either imports as a percentage of national consumption or exports as a percentage of national production. These percentages varied from about five to eight during prewar years. The percentages were markedly below the figures estimated for almost all other nations except the Soviet Union, India, and China. Imports, expressed as a percentage of consumption, were between 50 and 40 for such countries as Belgium, Norway, and Denmark; between 40 and 30 for nations like New Zealand and Eire; and between 30 and 20 for Sweden, Switzerland, the United Kingdom, and several other lands. The very low figures for the United States are attributable to its geographic size and protectionist attitudes.

The importance of foreign trade to the United States can best be realized if we investigate the matter from a qualitative

viewpoint. Even though total imports constitute only a small percentage of our aggregate national consumption, where would we be without many of the specific goods that we do import?

Table 1 indicates how grave is the dependence on imports of

TABLE 1
U. S. Imports as a Percentage of Consumption for Selected
Commodities Before the War

COMMODITY	PERCENTAGE	SOME USES
Crude rubber	100	Auto tires, medical supplies, corsets, and
Tin	. 100	Tin plate, bronze, bearings, solder
Coffee	. 100	Beverage
Raw silk	100	Apparel and hosiery
Newsprint	. 75	Newspapers, magazines, and so on
Sugar cane and beets	50	Sugar refining
Carpet wool	100	Carpets
Apparel wool		Wool cloth
Furs	50*	Apparel
Wood pulp		Paper and paper boards
Raw hides and skins	25 •	Leather
Jute fiber and burlap	. 100	Bags, wrapping materials, and carpets
Diamonds		Industrial cutting and personal adornmen
Nickel	. 99	Steel alloys, heating-stove filaments, and
Cocoa	. , 100	Beverages, chocolates, confectionery
Bananas	. 100	Food
Tea		Beverage
Tung oil	. 90	Quick-drying varnishes
Manganese ore		Steel alloys, batteries, and so on
Flaxseed		Linseed oil, animal food
Spices	. 100	Condiments and flavorings
Asbestos		Heat insulation, friction equipment
Chromite		Stainless steel, autos, heat-resistant wire
Tungsten		Alloys, cutting tools
Manila (Abaea) fiber		High grade cordage
Bauvite		Aluminum
Crude chicle.		Chewing gum
Quebracho		Leather tanning
Cobalt		Cutting tools and paints

a In value.

<sup>b</sup> High grade manganese ore. Source: Our 100 Leading Imports, U. S. Chamber of Commerce. Washington, D. C., 1945. an economy as self-sufficient even as that of the United States. The commodities in question are listed in the order of their total imported value. The percentage figures are approximate within a few points. The period is usually 1938-40.

This table shows how unpleasant complete self-sufficiency would be. We would have neither coffee, tea, nor cocoa to drink, and so our sugar poverty might escape notice. would be no gum to chew. There would be only inferior spices for our food. Newspapers would be much smaller. We would have very poor leather without quebracho for tanning. The American automobile would be produced with difficulty, even though synthetic rubber might be used in its tires, because chromite, cobalt, tungsten, manganese, nickel, and bauxite or their products are essential in the making of a modern car. These ores, or the metals made from them, are used in alloy form for the manufacture of crucial cutting tools, bearings, and many vital machine parts. Asbestos is used for brake linings, automobile clutches, insulating steam pipes, and all types of friction equipment. World War II, by cutting off the overseas sources of supply of many of these products, brought their importance home to the American people. Our industry could hardly continue without special metals for alloys, asbestos for friction equipment, leather belting, and cutting diamonds.

If so many of these imports are vital to our industry and are an accustomed convenience of our daily life, it follows that our export trade is equally essential to our well-being. These needed imports could not be purchased if we did not export goods in exchange. Exports are a necessary means of payment.

Exports are also important for another more immediate but less fundamental reason: the profits and incomes of a great many people depend upon our export trade. It may be true that we only export about seven per cent of our national production, but a great many goods are exported in much higher proportions. This is shown in Table 2, where the listed percentages are often far more significant than one might suspect.

In industry, where profits only begin when sales have exceeded the volume necessary to cover overhead, the ten or twenty per cent of production that is exported may determine whether companies are operating in the red or in the black. Industrial

## TABLE 2 U. S. Exports as a Percentage of Industrial and Agricultural Production in 1938.

Industry					
Aircraft and parts	22 18 15	Industrial machinery			
Agriculture					
Tobacco. Cotton. Rice. Apples.	28 19	Wheat         11           Lard         11           Hops         11			

<sup>\*</sup>Source: Testimony of the Secretary of the Treasury before Senate Subcommittee on Small Business, April 20, 1945.

and agricultural goods are often produced in a few cities or regions whose financial situation is closely connected with export sales. States like Virginia, Kentucky, and Alabama would feel the loss of our tobacco and cotton exports very seriously. The aircraft industry of the United States is highly localized, so that employment in certain towns depends rather directly on exports. That many producers have a very definite interest in exports is evidenced by the number of spokesmen who have testified from time to time before Congressional committees in support of the continuance of the Reciprocal Trade Agreements Act.

Exports and imports facilitate the important function of foreign investment. The United States is well-supplied with loanable funds. A great many financial institutions, operating companies, and private capitalists in this country are constantly seeking investment opportunities. This competition amongst lenders, together with certain governmental policies,

has served to lower the rate of return on domestic investment. Consequently, American investors began to lend abroad after World War I. Now, it is an economic fact, the reason for which is explained later in this book, that loans abroad must actually be transferred in the form of exports. Capital funds move in the form of goods and services. Therefore, exports are in reality part of the mechanism of foreign lending. Moreover, this process works in both directions. The dividends and interest earned on these investments, together with the principal, can only be paid by the borrowers if we will accept imports. In other words, in order to get our money back, we shall have to import. Under these circumstances, imports are desirable for an additional reason, and not simply because we need the specific commodities which are sent us.

The principal point of the preceding paragraphs is that the five to eight per cent of our national income that is composed of imports or exports is a very vital portion of the whole. Analogies are dangerous, but the American economy might be likened to the body of a man, and particular lines of production to different organs and limbs. Now, it is admitted that few of us would suffer, and some might benefit, from a loss in body weight of from five to eight per cent. But suppose the loss in weight is due, not to an even and overall shrinkage, but to the loss of an arm, a lung, or a more vital part? Shylock only wanted one pound of flesh. Similarly, the loss of certain imports could seriously cripple our economic life, and the loss of certain exports could bring financial distress to many localities.

The total foreign trade of the United States might be several times larger were it not for our protectionist tariff structure. Liberal tariff policies on our part, which would lead to increased imports, would provide foreigners with dollars for American exports. The imports of the United States under present tariff and quota restrictions are at a practical minimum. We could hardly get along in our daily lives if we imported less.

At present, we are permitting the importation of goods that we cannot grow, make, or extract. (which is only common sense), but we are preventing the importation of most goods which we can produce (which is a mistaken policy). It is a very naive view that a nation should strive for self-sufficiency in all the things it can produce. The technical possibility and economic desirability of producing a good at home are quite distinct matters.

There is usually a wide range of goods that can be made or grown, more or less advantageously depending upon the product, in any one of a dozen countries. The United States, because of its varied climate, resources, and human skills, is usually one of those dozen nations that can produce domestically if need be. Currently, but quite unnecessarily, it seems that we are trying to undertake the production of almost everything. It is to be hoped that saner counsels will ultimately prevail and that the United States will specialize along the lines of its comparative advantage and economize by accepting other goods as imports.

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#### Chapter 2

#### Some Facts and Figures

TINTERNATIONAL economics cannot be studied in a factual The many problems which make this subject so interesting and controversial are based on past and present conditions. For example, the importance of different national currencies is largely dependent upon the volume of world trade moving in and out of the countries concerned, and the extent to which some nations can import in excess of their exports is determined for the most part by the state of international investment. The diplomatic power of the United States over portions of Central America and her lack of influence in Argentina are due largely to world-trade patterns. Certain nations are far more dependent for their livelihood on international trade and investment than others, and this naturally gives them an exceptional interest in world peace; other countries are relatively self-sufficient, and consequently are less interested in international intercourse of any kind, volume and character of a nation's trade give a clue to its wealth and power and influence. The following statistics, if examined with the aid of a little imagination, have an interesting story to tell.

#### Merchandise Trade of the World

#### Exports and imports of major trading nations

Some nations play a much more active role in international trade than others. A considerable disparity exists also in the ratio of merchandise exports to imports. Information along these lines is given in Table 3 below. The data are for 1938, and the nations are listed in the order of their total trade in that year.

TABLE 3

EXPORTS AND IMPORTS OF MAJOR TRADING NATIONS IN 1938

COUNTRY	ABSOLUTE VALUES (\$000,000)		PER CAPITA VALUES (Nearest \$)		RATIO OF EXPORTS
	Exports	Imports	Exports	Imports	IMPORTS
United Kingdom	2,537	4,461	55	95	58
United States	3,091	1,960	24	15	158
Germany b	2,162	2,222	32	33	97
France	876	1,322	21	32	66
Canada	845	676	75	60	124
Japan (inc. Korea)	824	804	8	8	102
Belgium (inc. Luxem-					
bourg)	724	765	83	89	95
Netherlands	568	774	65	89	73
India (inc. Burma)	662	538	2-	1+	123
Italy	547	586	13	14	93
Australia	525	515	76	75	102
Sweden	463	523	75	83	89
Argentina	438	443	33	34	99
China c	312	510	1-	1+	62
Denmark	335	354	88	93	95
Switzerland	301	`363	72	86	83
Netherlands E. Indies.	379	268	5	4	141
Czechoslovakia	354	292	23	19	121
Malaya	326	314	62	59	104
Brazil	296	296	7	7	100
U.S S R	257	268	2-	2-	96
New Zealand	224	218	140	136	103

<sup>&</sup>lt;sup>a</sup> Source: Compiled from The Network of World Trade, League of Nations. Princeton: Princeton University Press, 1942.

<sup>c</sup> In 1935.

It is worth noting that the United States and the United Kingdom were the two leading traders of the world. Actually, the United States participated in about 12 per cent of all international trade in 1938 whereas the figure for the United Kingdom was even higher by about a third. The United

b German figures may be 25 per cent too high because of overvaluation of the reichsmark.

States was the world's greatest exporter that year and the United Kingdom was the leading importer. Also significant is the fact that the ratio of exports to imports is greatest in the case of the United States and least in that of the United Kingdom. The imperial nations, that is, the United Kingdom, France, Belgium, Netherlands, and Italy, all had import balances. A marked contrast is afforded by the self-containment of the Soviet Union, which had scarcely more total trade than little New Zealand.

These figures on merchandise trade throw some light on the relative demand which exists for different national currencies and claims. Most of the world's trade is handled in United States dollars and British pounds, for these are the monies of the nations carrying on the most international trade.

#### The composition of world trade

Thousands of different kinds of goods enter into international trade. These may be classified into three general types: (a) foodstuffs and live animals, (b) raw and partially manufactured materials, and (c) manufactured articles. The relative importance of these different classifications is shown in Table 4.

TABLE 4

Composition of World Trade in 1937 a

(in million dollars)

Classification	VALUE	FERCENTAGE OF TOTAL
Foodstuffs and live animals	\$ 6,020	22,4
Materials raw or partially manufactured	10,735	40.0
Manufactured articles	10,035	37.6
Total	\$26,790	100.0

<sup>\*</sup> Source: Compiled from data published in The Network of World Trade.

The first two classifications naturally include the important fuels, metals, cereals, and fibers. The breakdown of leading materials and foodstuffs in 1938 is given in Table 5.

TABLE 5

Leading World Exports of Raw Materials and Foodbruffs in 1938

(in million dollars)					
Petroleum1,140	Butter 304				
Cotton	Rubber				
Wheat and flour 569	Coffee				
Coal 530	Corn				
Beef, pork, lamb, and mutton 438	Тев				
Wool	Rice 197				
Tobacco	Trop ore 149				

a Source: Compiled from data published in The Network of World Trade, p. 30.

340

Copper..... 325

The great variety of manufactured articles renders it difficult to prepare a similar list of major products among the relatively finished goods. The most important groups of manufactured articles are steel products and textiles. Leading classifications within these groups would probably be machinery and cotton piece goods respectively.

One of the most striking characteristics of international trade is the varying degree to which different nations export manufactures. The United States, certain countries of Europe, and Japan have traditionally been the primary source of manufactured goods for the entire world. Many of these countries have, in consequence, come to depend upon a steady flow of food imports, and this often renders them extremely vulnerable to wartime blockades.

Table 6 shows the percentage importance of manufactures in the total exports and imports of seventeen different world areas. The third column indicates the excess of the export percentage over the import percentage figure. Column four ranks these last values according to algebraic magnitude. Only four of these regions—namely, the British Isles, Japan, industrial Europe, and the United States, exported manufactures in excess of 38 per cent, which is the average importance of such goods in world trade. The other thirteen areas are on a net-import basis as regards manufactures.

The breakdown of world areas in Table 6 is not without For example, there are really two Europes, one predominantly industrial and the other agricultural; the latter portions, comprising the Balkans, Denmark, eastern Eu-

TABLE 6 RELATIVE IMPORTANCE OF MANUFACTURES IN TRADE DURING 1937 .

	EXPORTS	imports	EXPORT % MINUS IMPORT %	RANK
1. North Africa	400	58%	-54	11
2. South Africa	7 `	83	-76	17
3. Tropical Africa .	2	73	-71	16
4. Canada	28	53	25	6
5. United States	50	20	+30	4
6 "Mmeral" Latin America	ī	62	-61	12
7. Tropical Agricultural America	1	67	66	13
8 Southern South America	3	70	-67	14
9. India (inc. Burma)	21	65	-11	8
10. Southeast Asia	4	56	-52	10
11. Japan (inc. Korea) .	70	21	+49	2
12. China (and "other Asia")	18	68	-50	9
13. U.S.S.R	18	38	-20	5
14. Industrial Continental Europe	63	23	+40	3
15. Agricultural Continental Europe	18	48	-30	7
16 British Isles*	72	18	+54	1
17. Australasia	4	74	-70	15

Source: Abstracted from part of Table 7 in The Network of World Trade.
 Includes Bolivia, Chile, Mexico, Curacao, Peru, Venezuela, and so on.
 Includes Brazil, Colombia, Cuba, and so on.

Includes Australia, New Zealand, and South Pacific Islands.

rope, and the Iberian peninsula, are responsible for less than a quarter of the trade of continental Europe. Latin America also, as will be explained later, embraces three significant subclassifications for purpose of foreign-trade analysis.

The trade composition of the United States and the British

de Includes Argentina, Paraguay, Uruguay. Includes British Malaya, French Indo-China, Netherlands East Indies, Philippines, and so on.

<sup>/</sup> Includes Manchuria, Hong Kong, Syria, Lebanon, and so on.

Includes Austria, Belgium, Czechoslovakia, France, Germany, Italy, Netherlands, Sweden, and Switzerland.

Includes Eire.

Isles bears closer examination. Table 7 provides additional detail in this connection, for dollar values are now included, and a distinction is made between foods and materials. Data for Australasia are also included by way of contrast. It may come as a surprise to some that the United States should be on a food-import basis. This condition is attributable in large

TABLE 7 TRADE COMPOSITION OF SELECTED REGIONS IN 1937 \* (in muliion dollars) b

FOODS	MATERIALS	MANU- FACTURES	TOTALS
(a)	(b)	(c)	
265 966	1,390 1,699	1,654 666	3,309 3,331
-701	-309	+988	-22
267 2,016	481 <b>2,</b> 016	1,926 886	2,674 4,918
-1,749	-1,535	+1,040	-2,244
400 62	453 138	36 570	889 770
+338	+315	534	119
	(a) 265 966 -701 267 2,016 -1,749 400 62	(a) (b) 265 1,390 966 1,699  -701 -309  267 481 2,016 2,016  -1,749 -1,535 400 453 62 138	FOODS         MATERIALS         FACTURES           (a)         (b)         (c)           265         1,390         1,654           966         1,699         666           -701         -309         +988           267         481         1,926           2,016         2,016         886           -1,749         -1,535         +1,040           400         453         36           62         138         570

measure to voluminous imports of coffee, sugar, and other tropical foods and to domestic "farm programs" which have raised costs and caused crops to be held off the market rather than be exported. The merchandise position of the British Isles, even before World War II, was also somewhat astounding. The British export balance on manufactures was insufficient to finance either the foods or materials imports alone. Australasia, on the other hand, is a heavy exporter of foods and materials, and these pay for imports of manufactures;

Source: Compiled from data published in The Network of World Trade.
 Value ciphers are only significant to ten millions of dollars.
 Includes Enc, Iceland, and the Faroes.
 Really "Oceania," but over 30 per cent of this trade is with Australia and New Zealand.

most of this trade is antipodean, connecting right around the world with the British Isles and continental Europe.

Regional concentration in production and consumption

Some areas export very large fractions of the total supply of certain goods entering world trade. Other areas import a high

TABLE 8 REGIONAL CONCENTRATION OF COMMODITY IMPORTS\*

	PERCENTAGE SHARE IN THE WEIGHT OF WORLD IMPORTS IN 1938				
"American Imports"	United States	British Isles	Ind. Europe		
Silk	69	7	13		
Cottonseed oil	59	12	8		
Bananas	56	13	17		
Coffee	49	1	33		
Cocoanut oil	45	11	14		
Tin	40	6	29		
Rubber (tree)	38	12	21		
Manganese ore	23	9	51		
Olive al	21	4	42		
"British Imports"					
Pork	4	81	10		
Beef and mutton	3	86	12		
Butter		78	16		
Tea	9	53	17		
Wheat	1	40	33		
Citrus fruit		36	37		
Zine		36	39		
Maize	•	33	51		
Gasoline		31	21		
Wool	5	29	56		
Cotton	1	19	37		

Source: The Network of World Trade, p. 33.
 As defined in Table 6.

percentage of various products which are traded internationally. This regional concentration highlights the extreme degree of specialization which characterizes so much of the world economy.

A few leading instances of regional concentration on the

supply side may be worth citing. The United States has almost a complete monopoly of helium gas. Following World War II the important aircraft manufacturers will be located in either the United States or the United Kingdom. Before the War, India supplied 90 per cent of the jute entering international trade; Malaya and the Netherlands East Indies were responsible for 89 per cent of the tree rubber; Japan for 78 per cent of the natural silk; Brazil for about 88 per cent of the coffee; Southeast Asia for 81 per cent of the cocoanut oil, 75 per cent of the copra, and 50 per cent of the tin; and nontropical Latin America for 80 per cent of the linseed oil. A number of other metallic ores, rope fibers, and vegetable products have unique sources.

The United States, the British Isles, and Industrial Europe (as defined on p. 22) are important buyers of certain internationally traded goods. Table 8 provides specific information on this point. It will be noted that the United States is a heavy purchaser of commodities that are imported into the United Kingdom to only a limited extent, and vice versa; for example, Britons are notoriously heavy tea drinkers while Americans prefer coffee. On the other hand, both America and Britain often find themselves competing with Industrial Europe for desired imports.

Occasionally, a high degree of regional specialization in production establishes a potential monopoly power, whereas concentration of consumption may create monopsony possibilities. An area that exports or imports a substantial fraction of the world's trade in some good can influence price under certain circumstances. For example, the United States can determine the price of helium within limits; and the United Kingdom, if it established a government purchasing board, might be able to modify the price at which it imports beef, mutton, and butter. However, monopoly or monopsony power of this kind is usually only latent and remains unrealized for lack of organization.

## Direction of United States trade

American readers will be particularly interested in the direction of trade of the United States. This is shown in Table 9 in values and percentages. The year chosen, 1938, is the latest complete prewar year for which published data are available.

The multilateral character of our trade is clearly shown in this table. The reader will note the striking lack of balance in the value of our export and import trade with certain areas. For example, we had an import balance of 180 million dollars with Southeast Asia and an export balance of 440 million dollars with the British Isles. Only by rare accident or deliberate government action will trade between specific areas exactly balance. However, United States trade with the rest of the world may be in somewhat closer balance because specific imbalances often tend to cancel one another.

The reader might ask, "How did Britain pay for her import balance with the United States of 440 million dollars?" Part of the answer is that United States imports from the predominantly British areas of India, Burma, Ceylon, and Southeast Asia exceeded our exports to them, in percentage terms, by about the same extent as our exports to Britain exceeded our imports from her. The rest of the answer involves a consideration of British income from investments, shipping, and other services, which will be discussed later. Thus, rubber imports into the United States from British Malaya provided some of the dollars used to import American cotton and tobacco into the United Kingdom.

Table 9 also reveals the varied pattern of our trade with Latin America. We have a fairly heavy import balance with the tropical agricultural countries—that is, Brazil, Cuba, and Colombis—owing largely to our purchases of sugar, coffee, fats and oils, and bananas. This heavy import balance is offset by our export balances to mineral-producing countries such as Mexico, Bolivia, Peru, Chile, Venezuela, and to the more temperate agricultural regions of Argentina, Uruguay, and

Paraguay. In our trade with Latin America we tend to be complementary to the tropical countries and competitive with the nations lying farther south. This complementary trade explains in part why our political relations with Brazil are usually better than with Argentina.

TABLE 9
DIRECTION OF UNITED STATES MERCHANDISE TRADE IN 1938

	VALU	ES (\$000)	,000) ¢	PERCENTAGES		
AREA <sup>b</sup>	EX-	IM-		EX-	IM-	
	PORTS	PORTS	DIFF.	PORTS	PORTS	DIFF.
	(+)	(-)		(+)	<u>(~)</u>	
1. North Africa	20	10	10	.7	.4	.3
2. South Africa	70	30	40	2.2 +	1.4	.8
3. Tropical Africa	20	30	-10	.7	1.4	7
4. Canada d	480	290	190	15.4	13.2	2.2
6. "Mineral" Latin						
America	210	170	40	6.8	7.8	-1.0
7. Tropical Agricultural						
America	260	340	-80	8.3	15.5	-7.2
8. Southern South						
America	90	50	40	2.9	2.3	.6
9. India (inc. Burma)	• 40	90	-50	1.3	4.1	-2.8
O. Southeast Asia	130	310	-180	4.2	14.2	-10.0
1. Japan (mc. Korea)	240	140	100	7.7	6.4	1.3
2. China, and so on	90	70	20	2.9	3.2	3
3. U.S.S R	70	30	40	2.2 +	1.4	.8
4. "Industrial" Cont.						
Europe	600	370	230	19.3	16.9	2,4
5. Agricultural Europe .	150	130	20	4.8	5.9	-1.1
6. British Isles	550	110	440	17.7	5.0	12.7
7. Australasia	90	20	70	29	.9	2.0
Total	3,110	2,190	920	100.0	100.0	00 0

Source: Network of World Trade, pp. 46, 47.

# The Interregional Character of World Trade

The world is divided into more than fifty distinct political territories. Accordingly, it would be almost impossible for anyone to gain a detailed impression of the interlaced trade

See Table 6 for area definitions.

Correct to nearest ten million dollars.
 Number 5 has been purposely omitted.

of each of these numerous areas. Fortunately, this is not necessary. Many countries possess certain likenesses and dissimilarities which permit most of them to be classified into five regional groups. The trade patterns of these five groups can be visualized.

#### Classification into groups

One possible basis of classification is according to whether labor is scarce (and therefore expensive) relative to abundant (and therefore cheap) natural resources or capital. For example, many countries in the temperate zones which have only been recently settled, historically speaking, such as Australia, South Africa, Canada, and Argentina, are notable for their abundant natural resources and relatively scarce labor. On the other hand, countries like India have extremely abundant (cheap) labor, but capital and natural resources both are relatively scarce (expensive). Most of continental Europe is notorious for its population pressure upon natural resources, but capital is neither particularly expensive nor cheap.

All things considered, the following five-way breakdown is revealing. These five regional groups are made up of certain of the seventeen areas already enumerated in Table 6. They are as follows:

- A. Tropical Regions, consisting of Tropical Africa, "Mineral" Latin America, Tropical America, India (including Burma), and Southeast Asia.
- B. The United States, including Alaska and Hawaii.
- C. Recently Settled Temperate Regions, consisting of South Africa, Canada, Southern South America, and Australasia.
- D. European Continent, consisting of all Europe save Russia and the British Isles.
- E. The British Isles, including Eire.

This system of classification does not embrace the entire world; specifically, the Soviet Union, Japan (including Korea), China with its hinterland, and Northern Africa are all omitted.

A very high percentage of the trade of the world, despite long freight hauls which often intervene, is conducted among these five regions, because they are well suited to produce different sorts of commodities and have specialized their economies.

## Regional specialization

Variation in productive aptitude, as already mentioned, is usually due to relative differences in the cost of labor, capital, and natural resources. A country with high labor costs concentrates on goods that do not require a great deal of labor. Generalizations are always dangerous, but the following grid indicates some of these cost differences amongst the five regional groups we are now considering.

	<b>A</b>	В	C RECENTLY	D	Œ
	TROPICS	υ. 8.	SETTLED	EUROPE	BRIT. IS.
Labor Capital	Cheap	Expensive	Expensive	Cheap	Moderate
	Expensive	Cheap	Moderate	Moderate	Cheap
Resources	Expensive	Cheap	Cheap	Expensive	Expensive

Such cost differences are relative within the region concerned. Thus natural resources in the United States may not seem very cheap in an absolute sense, but they are inexpensive relative to labor and compared with other regional groups. In the case of the United States this is because of the abundance of natural resources and capital relative to labor. Scarce productive factors are always expensive, and abundant ones are always cheap in comparison.

The grid which appears above might be summarized in another way by indicating which factors are in long supply relative to those which are in short supply. Such an arrangement, when worked out for all five regional groups, would probably approximate the following:

	LONG SUPPLY	SHORT SUPPLY
A. Tropics	labor	capital funds and natural resources
B. United States	naturai resources	labor
C. Recently settled	natural resources	labor
D. European Continent	labor	natural resources
E. British Isles	capital funds	labor

From the personal viewpoint, it is always remunerative to be the supplier of a relatively scarce factor and to have all other factors available in abundance. Labor in the United States, therefore, enjoys a superior position to any other regional group in the world. Working people fare slightly less well on an average in the recently settled regions (where only natural resources are abundant relative to labor) and in the British Isles (where only capital has been in especially long supply). On the European continent natural resources are at a premium, and labor is relatively unimportant. The situation of the common man is worst in the tropics, where natural resources and capital both tend to be scarce relative to labor.

## Multilateral trade of the regional groups

These differences in the cost relations of the major productive factors have prompted merchandise trade among these five regional groups as shown in Table 10. Thus in 1938 the Tropics (Region A) exported 885 million dollars worth of goods to the United States (Region B), and in the same year the reverse trade from Regions B to A was 710 million. Thus the net flow of trade was from Regions A to B and amounted to 175 million. A little subtraction will show that the Tropics (Region A) had also net exports to Region C (105 million), Region D (310 million), and Region E (165 million).

Figure 1 shows the net merchandise flows among these five regions. The arrows show the direction of this trade flow. It will be noted that Region A had net exports to Regions B, C, D, and E; Region B had net exports to Regions C, D, and E;

Region C had net exports to Règions D and E; and Region D had net exports to Region E. Consequently, Region E had net imports from all regions. These five regions have been lettered in such an order that each imports from preceding regions and exports to succeeding regions.

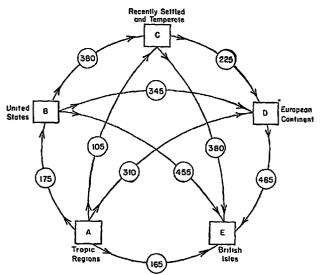


Figure 1. Source: Based on data appearing on p. 90 of The Network of World Trade.

This diagram shows that at least three of the regional groups are part of a multilateral system. Especially is this evident in the case of the countries of recent settlement in the temperate zone. Region C imports heavily from the Tropics and the United States (485 million), but more than pays for this by exports to the European continent and the British Isles (605 million). On the other hand, the British Isles made current payments to all other regions for her net imports, and

TABLE 10							
MERCHANDISE	TRADE	OF	Five	REGIONAL	GROUPS	IN	1938 •

IMPORTS			EXPORTS FRO	M	
70	A	В	C	D	E
Α		710	130	870	515
В	885		380	475	105
Ċ	. 235	760		420	775
Ď	1,180	820	645		755
Ē	680	560	1,155	1,240	

Source Compiled from data appearing in The Network of World Trade, Tables 22 and 23

the Tropics earned current receipts from all regions. How this is possible is partially explained in the following two sections.

The dozens of countries that have been arranged into these five regional groups might have been sorted out according to some other pattern. Each different grouping will reveal a different network of world trade; however, the groups set up for Figure 1 and its supporting table possess an economic rationale, and hence the trade flows among them are particularly significant. Of course, a great deal of international trade remains within each regional group and consequently is overlooked by these statistics.

### Service Income

All countries "import" and "export" services in the sense that the national economy buys services from, and sells services to, foreign residents. Important examples of international services are transporting foreign-owned goods, caring for alien tourists, and acting as an insurance agent or stock broker for residents abroad. A small country like Switzerland earns a very high percentage of its foreign exchange from the international freight that moves across its railroads, and from the tourists who come to admire its scenery or benefit from the climate. However, there are many other countries to which service earnings and expenses are even more important in an absolute sense.

Table 11 shows the net service income or payments of fifteen countries, for which, preceding World War II, this financial item was greatest in the aggregate. Wherever possible, these data relate to 1938. The largest recipient of service income was the British Isles (598.9 million dollars) and the largest disburser of service payments was the United States (295.8 million dollars). The British receipts were attributable to her shipping, brokerage commissions, and insurance earnings. France's position was bolstered by her enormous tourist trade and by virtue of her being the financial center of an overseas empire. Canada is also obligated to the American

TABLE 11

Largest Service Incomes Received and Paid (in millions of dollars)

COUNTRY	YEAR	RECEIVED (+)	PAID (—)	REGIONAL GROUP
British Isles	1938	598.9		E
France	1938	233.1		D
Italy	1932	215.9		D
Canada	1938	175.1		С
China	1936	139.4		_
Germany	1935	136.0		D
Netherlands	1938	133.1		D
Norway	1938	128.2		D
Belgium	1936	68.5		D
Denmark	1938	59.0		D
U. S. Africa	1937		35.4	C
Argentina	1938		45.9	ç
N. E. Indies	1938		59.2	Ā
India1			68.3	A
United States	1938		295.8	В

<sup>&</sup>lt;sup>a</sup> Source: Compiled from The Balance of Payments, 1938, pp. 14-18, the League of Nations.

tourist, and the Netherlands is, of course, the metropolitan area for extensive overseas possessions. Norway's receipts, which are amazingly high in view of her economic size, are largely due to her merchant marine. Germany and the Netherlands also enjoyed an important "carrier" business. The heavy United States payments are attributable to American tourists and the small size of the prewar merchant marine engaged in the foreign carrying trade.

The regional groups into which these countries fall, classified according to the system developed in the preceding section. is worth noting. The countries which import services are in almost all cases located in the regional groups which export merchandise, and vice versa. Thus the only Tropical Region countries listed, that is, India and the Netherlands East Indies, which are both in Region A, have a balance to pay on account of services. The United States also makes service payments. On the other hand, the British Isles, which has the largest of all merchandise import balances, was the leading service exporter. Similarly, the seven listed countries of the European Continent receive service income, without exception, and their regional group (D) is an importer of merchandise. Between these two groups is Region C, comprising countries of recent settlement in the temperate belts. This regional group has a mixed-merchandise trade pattern of imports from the Tropics and the United States, and compensating exports to the European Continent and the British Isles. The situation of Region C regarding service income and payments is also mixed: Canada exports services, whereas the Union of South Africa and Argentina import them. This brief recital serves to demonstrate the frequently opposing flow of merchandise and service trade.

## Earnings on Investments

The economic growth and history of past generations have left a heritage of international investment. Private persons, corporations, and governments invest and borrow on a world-wide scale. The more prosperous countries, in which wealthier companies and persons reside, evolve into international creditors and investors. Less mature countries in need of development usually gravitate towards a debtor status and become the sites of assets owned by foreigners.

Statistical information on the investment situation of most countries is scanty. However, this does not greatly matter, for the ranking and significance of foreign investments can be gauged by reference to the net interest and dividend position of each nation. The country that has the largest net receipts of interest and dividends will usually be that nation which has net foreign investments of the greatest capital value. Fortunately, information regarding interest (on loans), dividends (on corporate stocks), and direct profits (on tangible assets acquired abroad) is reasonably adequate.

TABLE 12

LARGEST INTEREST AND DIVIDEND RECEIPTS AND PAYMENTS
BEFORE THE WAR<sup>a</sup>
(Annual averages, in millions of dollars)

United Kingdom	(1929-38)	+1,178 1
United States	(1929-38)	+654 3
France (inc. overseas)	(1929-38)	+180 5
Netherlands.	(1934-38)	+85.3
Belgium-Luxemburg (inc. Congo)	(1929, 35, 36)	+54 5
Ireland	(1933-38)	+29 3
Sweden	(1928-37)	+17.9
Czechoslovakia	(1928-37)	-19.8
Denmark.	(1929-38)	-220
Norway	(1929-38)	-22.9
New Zealand	(1929-38)	-51 6
Italy	(1928-32)	-76 2
China	(1928-36)	-104.3
Netherlands Indies	(1929-38)	-104.7
Union of South Africa	(1928-37)	-109.2
India	(1929-38)	155 6
Argentina	(1929-38)	-176.1
Australia	(1929-38)	-191 5
Germany (ex. reparations)	(1927-35)	-299.6
Canada	(1929-38)	-319.4

<sup>&</sup>lt;sup>a</sup> Source: Balance of Payments. League of Nations, 1938 (The data have been revised.)

Table 12 gives the net interest and dividend receipts and payments of twenty leading nations before World War II. The figures are annual averages, in most cases for the ten-year period 1929-1938 inclusive. The figures do not normally include direct profits on tangible assets acquired by individuals

abroad. This omission is quantitatively unimportant, as most foreign investment involves purchasing the securities of foreign corporations and governments. The all but twenty nations that are omitted from the table occupied net positions between that of Sweden (a moderate creditor) and Czechoslovakia (a moderate debtor).

The prewar creditor position of the United Kingdom was quite remarkable and permitted the very large merchandise import balance already commented upon. The debtor position of Germany was due not only to her large borrowings during the interwar period, but also to the loss of many overseas assets following World War I. No country of Regional Groups A or C is to be found in the creditor portion of Table 12; tropical and recently settled countries are usually poor or are in the process of being developed with the aid of foreign funds.

Investment earnings, taken together with service income, offset much of the imbalance which exists in the merchandise trade account of most countries and regional groups.

## Plane of Living and Importance of Foreign Trade

Nations vary considerably in the consumption levels that they enjoy and the volume of their foreign trade. In most cases these two characteristics tend to be positively related—that is, countries that carry on a large amount of international trade can afford more comforts, and even luxuries. The converse is generally true also. The following statistics support this view.

The extent to which a country engages in foreign trade can be measured in various ways. The method employed here is to calculate the per-capita value of the imports and exports of each nation. To arrange countries according to their standards of living is more difficult because of the wide differences in tastes and price levels. One measure, not infrequently used, is to take the number of telephones per thousand population as a rough guide to living conditions.

Table 13 presents these two series for fourteen selected countries. Column 1 is the dollar value of per-capita exports and imports in 1938. Column 2 shows the number of telephone instruments in use per thousand population during the period 1937 to 1939. Each country is ranked for each characteristic. With the exception of the United States, the rankings are extremely similar. For example, of these fourteen arbitrarily selected countries, New Zealand is first and second in the matter of per-capita trade and installation of telephones respectively.

The case of the United States stresses an important qualification to the general rule that countries that engage actively in international trade are able to maintain high living standards. Nations that are geographically large, especially when they are of continental proportions, have relatively little external trade because they can practice intense geographical

TABLE 13

RELATIONSHIP OF TRADE VOLUME TO CONS
OF SELECTED COUNTRIES

ON LEVELS\*

COUNTRY	TRADE PE	R CAPITA <sup>5</sup>	TELEPHONES PER THOUSAND POPULATION		
	8	Rank	No.	Rank	
New Zealand	276	1	128.8	2	
Denmark	181	2	107.1	6	
Sweden	158	3.5	124.9	3	
Switzerland	158	3.5	107.2	5	
Netherlands	154	5	50.0	10	
Australia	151	6	90.0	7	
United Kingdom	150	7	62.9	8	
Canada	135	8	121.4	4	
Argentina	67	9	23.5	12	
Germany	65	10	50.3	9	
France	53	11	37.0	11	
United States	39	12	149.6	1	
Italy,	27	13	14.2	13	
Japan	16	14	13.9	14	

Source: The Network of World Trade, for trade per capita, and the Foreign Commerce Yearbook, 1939, for telephone data.

For a selected year during the period 1937-39.

specialization within their own boundaries. The opposite situation is found amongst the European countries where a good cannot travel many hundreds of miles without crossing a national frontier; the trade of Belgium with the countries of Europe is not unlike the trade of Illinois with the remainder of the American states.

Countries with the highest standards of living are also those that carry on relatively the most foreign trade for their size. Nations that are populated with comparatively prosperous people can afford to eat exotic foods as well as local produce, to import all kinds of tobaccos and beverages, to wear clothes made out of the most durable and soft fibers, to have machines requiring special materials for their construction, and to buy handmade goods from the finest craftsmen to be found throughout the world. The retained imports of the richer countries comprise all the fine things mentioned above, but such goods would not have been imported unless previous exports had made them financially possible by providing the means of payment. Accordingly, most prosperous countries are actively engaged in exporting and importing. Exporting is a means, but importing is the end.

## Dynamic Change and the World Economy

It is often stated that nothing is as unchanging as change itself. This statement definitely applies to international trade and finance. New substitutes destroy the commercial importance of previously employed commodities. Economic fluctuations have an uneven incidence on the value and quantity of merchandise trade. And already, during the present century, two World Wars have reversed the financial status of more than one country.

The development of new products has often done much to undermine the export trade and financial position of the principal suppliers of the replaced good. Increasing substitution of petroleum for coal has adversely affected the balance of payments of the United Kingdom. Development of rayon

and other manufactured fibers has hurt the cotton exports of countries such as the United States and the silk exports of Japan. A most striking example is that of Chilean nitrates. In 1900, 66.6 per cent of the world supply of nitrates came from natural deposits in Chile, and the balance from coal. Thirty-four years later, 74.5 per cent of the world supply of chemical nitrogen was derived from the air and only 6.9 per cent from Chilean deposits. This development of atmospherically derived nitrates dealt a body blow to the economy of Chile. The rise of synthetic-rubber production in the United States during World War II casts a shadow over the future of tree rubber from Southeast Asia.

The changing relationship of agricultural and industrial exports from the United States also involves a spectacular shift in emphasis. At the beginning of the century the United States was one of the principal world suppliers of wheat, cotton, tobacco, and other agricultural commodities; moreover, these exports comprised a high percentage of total American production. Table 14 shows the decline of these percentages during successive decades of the twentieth century.

TABLE 14

Selected Agricultural Exports of the United States as Percentage of
Total Production by Decades\*

PERIOD	WHEAT	COTTON	TOBACCO	PORK	LARD
1900-09	21.9	67.1	35.4	10.0	34.8
1910-19		58.3	37.0	11.4	30.9
1920-29		56.6	38.8	6.9	34 8
1930-39		50.0	31.4	1.6	18 5
40-year average,		57.6	35.6	7.2	29.8

<sup>&</sup>lt;sup>a</sup> Source: Weighted averages for 10-year periods, calculated from Agricultural Statistics, 1942. Washington, D. C., Dept. of Agriculture.

During 1901-05 wheat, cotton, and edible animal products constituted 45 per cent of our total exports, whereas our four leading manufactures comprised only 13 per cent of this same total, but by 1937 this relationship was almost exactly re-

versed! The United States, within less than forty years, had altered its export emphasis from agricultural to industrial products.

For several reasons international trade is extremely vulnerable to economic fluctuations. Most merchandise trade involves the more industrialized countries of the world, and it is precisely these nations that are most subject to the ups and downs of the business cycle. Moreover, a large share of international trade consists of primary commodities, and it is notorious that the demand for raw materials, and their prices, are affected violently by prosperity and depression.

TABLE 15
MINIMUM EXPORTS A PERCENTAGE OF MAXIMUM EXPORTS FOR
SELECTED COUNTRIES, 1934-38

78	Germany 71
	Australia
77	Belgium
77	Canada
74	United States 64
73	Cubs 58
72	Argentina
71	Chile 50
	77 74 73 72

<sup>\*</sup> Source: Compiled from Foreign Commerce Yearbook, and from Foreign Commerce and Navigation of the United States, Dept. of Commerce.

Table 15 shows the great change that can occur in the value of a nation's exports during so short a period as five years or less. Some of these fluctuations are very considerable. Chile's poorest year was only half as good as her best during this period, and Argentina fared little better. A sudden change in export values for these countries has a direct and forceful effect on how much they consume, for without great industrial facilities, exports are the main source of income from which Chile and Argentina must buy a wide range of necessary imports.

The United States is less vulnerable to such sudden changes

in the value of exports because her relative participation in foreign trade is of a rather low order. Statistics show that a change of one third in our exports, such as took place during 1934-1938, could hardly affect our national income by more than 2 per cent. This relative stability is in marked contrast to the position of many smaller countries which may be more violently influenced by a smaller percentage change in export values.

Wars have a way of substantially modifying the investment status of nations. The more hard-pressed belligerents must often sacrifice the accumulated foreign investments of past generations, whereas other countries may be able to increase exports and so improve their international capital situation. The vanquished countries are most likely compelled to sacrifice their foreign assets as reparations. World War I saw the United States converted from a debtor to a creditor nation, whereas Germany lost most of its assets located abroad. World War II has converted India from a debtor nation to an important creditor of the British Isles. Canada, which before World War II made larger net annual payments of interest and dividends than any other country, emerged from the war as a creditor nation.

The outstanding change of recent years has been the catastrophic effect of six years of war upon the United Kingdom. In 1939, the British net creditor position amounted to 13 billion dollars, but this had been changed, by 1945, to a net debtor status of three billion dollars, which constitutes a shift of almost 17 billion dollars. Moreover, during 1946 the United Kingdom commenced to borrow an additional 4.4 billion dollars from the United States. Before World War II the United Kingdom was the world's leading recipient of interest and dividends, and used this income to help finance the world's greatest import balance. This income is likely to be much smaller in the future, and the repercussions of this change on other countries will be felt for years to come.

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## Chapter 3

## The Interwar Period

THE twenty-one years that intervened between the two World Wars are now fading into history, but they contain many lessons relating to international finance and trade. History has a way of repeating itself; for example, most belligerent powers were plagued by currency difficulties after World War I, and this is now occurring once again. The interwar years witnessed an accelerating development of mercantilistic or nationalistic attitudes and regulations, and, unfortunately, the postwar years are inheriting this handicap of mind and jungle of restraint. The period between the Wars raised a great many questions that were never satisfactorily answered, but merely set aside by hostilities. The same problems, further complicated in the interval, are again in full view and are demanding solution now that the turmoil of World War II is subsiding. Hence, it is important to understand how the world fell into the economic predicament from which it remains to be extricated. Policy makers, with the experiences of the interwar period as a warning, must learn to be economic statesmen.

## Internal Currency Weakness after World War I

World War I placed a great strain on the domestic money systems of almost all belligerent powers. This difficulty naturally proved greatest in the case of the defeated countries. However, a number of the "victors," such as Belgium, France, and Italy, were finally forced to acknowledge currency depreciations approaching 80 per cent. Only the United States had

tew money troubles and was able to return to her prewar gold standard upon cessation of hostilities.

Governments are faced with enormous expenditures in wartime and during the ensuing period of rehabilitation. They must secure the necessary money by some combination of taxing, borrowing from the public, or creating new money. The latter, which is clearly inflationary and drives prices up, can be accomplished either by forcing the banks to advance credit or by printing paper notes. Inflationary financing is politically the most popular course at the outset and consequently a great many governments adopted this supposedly painless escape.

The increased money supply during the war years, coupled with a reduction in the output of civilian goods, raised prices and decreased the purchasing power of a unit of money. By 1920, as compared with 1914, wholesale prices had advanced by about seven times in Italy, by six times in France, by three times in Great Britain and the United States, and by two times in Germany. This steady and sometimes rapid depreciation in purchasing power inevitably raised doubts concerning the future worth of different monies and caused a large volume of international speculation in the various currencies.

This uncertainty and speculation was increased by the wartime severance of the link with gold. Before World War I all the major currencies were defined in terms of gold and were redeemable in it. A great deal of the money in circulation actually consisted of gold coins, with convertible paper notes comprising the remainder. In prewar days these two kinds of money circulated at par with each other. However, during World War I, as the paper-note issue was expanded without the backing of additional reserves, a tendency developed for the gold to be hoarded and the paper notes to pass at a discount. All governments anticipated this reaction in time to call in and secure most of the circulating gold coinage, for which they issued paper notes in exchange. A necessarily related measure was to leave the traditional gold-specie stand-

ard by canceling the privilege of gold redemption formerly extended to note holders.

The monetary experts of the various nations realized full well that currency stability and, consequently, safer international trade and investment, would have to wait upon governments balancing their budgets and a redefinition of the various national monies in terms of gold. It was asserted in some quarters that a formal devaluation in terms of gold, which would in reality only recognize the depreciation in purchasing power that had already taken place in most currencies, would stabilize exchange rates provided that governments would in future live within their means. However, this viewpoint was unable to gain sufficient acceptance at the first international monetary conference held in Brussels during 1920.

The nations were not ready to return to a gold standard in 1920. One explanation lay in the uneven distribution of gold which had occurred during World War I, with one half of the world's stock in the United States and over a quarter being held in Great Britain and France. The other nations, and notably Italy amongst the victors, lacked sufficient gold reserves to restore the convertibility of their currencies. The inadequacy of gold stocks as a monetary reserve was further accentuated by the manifold expansion of the monetary circulation in most countries. This last difficulty could only be overcome by a formal devaluation of the national money, which would allow a unit of gold to be used as a reserve against more units of the local currency. However, formal devaluation was politically unpopular. The man in the street recognized that the purchasing power of the currency had depreciated to perhaps 20 per cent of its prewar value, but hoped that this lapse was only temporary. The people who had relatively fixed incomes were being squeezed by inflation and were naturally opposed to legal action that would indefinitely perpetuate their impoverished situation. Moreover, it was felt in each country that devaluation would tarnish the national prestige in the eyes of the world.

The Genoa Conference of 1922 recommended the establishment of a gold-exchange standard as a solution of the relatively unequal gold holdings of different countries. Nations with adequate gold reserves should return to a gold standard, and countries that lacked sufficient gold stocks should stand ready to redeem their monies with gold-standard currencies. For example, if Britain were on gold, but France were not, the Bank of France might obligate itself to convert francs into pounds sterling; in this way a holder of francs would be able via pounds to obtain a predetermined amount of gold. It was believed that such an arrangement would make for a more economical use of gold reserves.

However, the recommendations of the Genoa Conference were not generally put into effect until the catastrophic inflations of Germany and other Central European countries had The real German inflation started run their fateful course. after the peace treaty was signed. Economic output was at a standstill, so that goods were scarcer even than before. The newly founded Weimar Republic, principally because of reparation payments, had a most lopsided budget that was balanced by borrowing newly printed bank notes. The resultant hyperinflation progressed at a geometric pace and by 1924 a mark had depreciated to 0.000,000,000,0001 of its 1914 value. At this point, six years after the Armistice, the French gave up their policy of armed repression and other allied powers cooperated to put German finances on their feet. A new mark was issued, worth about 24¢ in American money of the time, and which exchanged for one trillion marks of the depreciated issue. Currency reform in Germany also had a stabilizing effect in neighboring countries.

A number of nations returned to the gold standard in 1924 and the immediately succeeding years. The parade may be summarized as follows: in 1924, Germany, Sweden, and Hungary; in 1925, the United Kingdom, the Netherlands and their East Indies, Australia. New Zealand, the Union of South Africa, and Switzerland; in 1926, Finland and Belgium; in

1927, Denmark, Czechoslovakia, Poland, and Italy; and in 1928, France, Norway, and Argentina. Many of these nations, before graduating to the status of being on a gold standard, temporarily remained on a gold-exchange standard as already described.

In 1925 the British returned to a gold standard at the prewar parity. This action was probably dictated by national pride rather than sound economic judgment. It is true that such a relatively high gold value of the pound maintained the overseas purchasing power of Britain's foreign investment. However, in view of the increase in domestic costs which had occurred during the war, British exports appeared high-priced and the British were, consequently, handicapped in recapturing their prewar markets.

Many of the major trading nations had been waiting for Britain to determine the gold value of sterling before they committed their own currencies to a definite gold price. A country like Denmark, having close trade connections with Britain and Germany, was primarily anxious to secure an advantageous rate for its currency against sterling and the reichsmark, and was concerned only with the gold price of its money as a means towards this end. Shortly after 1925, by which time the United States, Germany, and Great Britain had returned to a gold standard, other trading nations followed their example.

The longest delay in returning to a gold standard was in the case of France. This tardiness was attributable to the moral cowardice of the succession of French governments that failed to balance the budget. Consequently the inflationary pressure in France was constantly mounting; moreover, the powerful rentier class was opposed to any formal devaluation of money that would confirm the domestic inflation which had already undermined the franc. Not until 1928 did the desperate nature of the situation lead to the formation of the Poincaré government and the introduction of a balanced budget and other financial reforms. The French government

placed the franc on a gold-bullion standard in this same year. These forthright measures so convinced the financial community that the franc was restored to strength that there developed an influx of gold into France which was to continue for several years.

The gold standard established during the interwar period was a gold-bullion standard, and not a gold-specie standard as had traditionally been the case. To take the case of Great Britain, as an example, it was no longer possible to demand a gold sovereign for a pound note, but the Bank of England did stand ready to sell a bar of gold for sterling currency. This gold bar, or bullion, consisted of not less than 400 fine ounces and was worth over \$8,000.00 at that time. Practically, there was no gold redemption for the man in the street, but international financiers could still transfer funds from country to country in the form of gold.

By the end of 1928, ten years after the Armistice, all the leading countries were adhering to this new type of gold standard. As a result, exchange-rate stability prevailed temporarily. However, the gold stocks of many countries were meager, and any sudden shift in international payments threatened to strip them of all reserves and force them to devalue their money or depart from the gold standard.

## Precarious Equilibrium During the Boom Years

The international monetary mechanism was called upon to handle several very large capital transfers during the interwar period. These were German reparations to countries such as France; the Inter-Ally War Debts such as that owed by France to the United States; and the huge investments in Europe made by the United States over several years. Fortuitously enough, for a short period these opposite capital movements across the Atlantic neutralized one another, and consequently did not place any special strain on the foreign exchanges. However, after 1929, by which time the boom in the United States had burst, there were no longer any large in-

vestments being made by America in Europe. A part of the system suddenly ceased to exist. Inevitably, within a few years the foreign-exchange machinery began to break down.

The Versailles Treaty made Germany responsible for all war losses suffered by the Allied governments and nationals. 1921 Germany was presented a bill for 32 billion dollars, was made liable for the Belgian war debt of about 1.5 billion dollars, and was instructed to begin annual payments of three quarters of a billion dollars. For two years Germany managed to meet these demands by transferring large quantities of goods and by borrowing newly printed reichsmark notes from German banks. Neither of these two expedients could long endure. Available stocks of coal, livestock, shipping, and railroad equipment were soon depleted. There was incipient inflation. Finally, when Germany was declared in default early in 1923, France and Belgium jointly occupied the Ruhr with their troops, and the Germans organized a campaign of passive resistance. The disrupted German economy threatened to keep Europe in chaos.

In 1924 a committee of experts, brought together under the unofficial auspices of the United States, met to consider a new reparations plan. The Dawes Committee, named after its American chairman, recommended small graduated payments to be made until 1928, after which regular instalments of about 625 million dollars were to be paid. The Committee avoided the problem of determining the total reparations bill, and consequently set no time limit to the scheduled instalments. In order to facilitate the transfer of reparations, it was proposed that a portion of the payments might be made in kind: it was also recommended that if financial payment led to a depreciation of the mark on foreign exchanges, the amounts due could be accumulated in Germany to the credit of the Allies instead of being converted into francs or pounds as the case might be. A Commissioner was appointed to earmark certain revenues of the German government for reparations account. The Dawes proposals were put into effect almost immediately and Germany was encouraged to borrow 200 million dollars in order to launch the new reichsmark issue.

What was intended to be a more definitive settlement of German reparations was reached by the Young Committee in 1929. This group suggested annual payments of 474 million dollars until 1988. France was to receive the largest single share of this sum. The earmarking of government revenues ceased, and Germany was restored to full fiscal autonomy. Inasmuch as Germany had been making her payments regularly during recent years, it was hoped that no difficulties would be experienced in complying with the new and more moderate instalment plan.

The matter of Inter-Ally war debts further complicated the scene. The United States had lent large sums of money to Great Britain, France, Italy, and other European allies. These loans were primarily made to permit the purchase of munitions, textiles, materials, and foods, and had been advanced before, during, and after direct American participation in the war. Great Britain had in turn made loans to France, Belgium, Italy, and others. France had also made loans to such nations as Rumania. During the years immediately following the war, a number of readjustments were made, regarding principal and interest, until the over-all war-debt situation presented the following appearance at the time the Young Committee met.

Actually, France, Great Britain, and Italy were the only debtors who were also creditors. This dual relationship bulked largest in the case of Great Britain, which stood to receive rather more than 50¢ for every dollar (gross) she owed to the United States. The final creditor of the entire system of Inter-Ally war debts, and the only nation which had no gross liabilities either, was the United States.

From the outset the European Allies, obviously counter to the inclinations of the United States, sought to link reparations to war debts. In fact the reparation schedules worked out for Germany by the Young Plan were adjusted to cover each recipient's war-debt payments and to yield a surplus or "net indemnity." For example, during the period 1931-66, it was anticipated that France would be able to retain 38 per cent of the payments received from Germany after paying her war debts. Comparable estimates for other countries were 13 per

TABLE 16

Total Anticipated Net Inter-Ally War Debt Payments 1923-1990 (in billion dollars)

France	-10.7 -5.5 -3.7
Rumania Bulgaria Yugoslavia Greece Portugal	-1.7
United States	+21.6

cent for Great Britain, 18 per cent for Italy, and 60 per cent for Belgium. These percentage figures are most important because they reveal why Great Britain was always prepared to forego reparations provided the United States would cancel the war debts, whereas France remained adamant regarding German reparations until the bitter end.

During the latter 1920's the various European Allies received reparations from Germany, most of which were sent on as war debts to the United States. These payments from Europe to the United States were not made in the form of merchandise shipments westward across the Atlantic. On the contrary, during these years the United States had a net export balance with the world as a whole of about 800 million dollars annually. A large share of this trade was with Europe. However, Europe was able for several years to pay its war debts and to

make net purchases of goods and services from the United States because of the large lending operations of the American economy.

Before World War I, the United States was a debtor country, and the American investor paid little attention to foreign securities. However, the years of "Coolidge prosperity" led to a large accumulation of loanable funds in the hands of private investors in the United States. A number of New York investment bankers, attracted by the large profits to be made in launching new subscriptions, encouraged foreign governments and companies to sell bonds on the American market. Municipalities in Central Europe and Latin America, encouraged by Wall Street middlemen to issue bonds which they could market, were usually able to conjure up projects that would require the borrowing of funds. These new issues were denominated in dollars in order better to suit the American investor.

The peak movement of dollar loans occurred during 1927 and 1928. The net increase in dollar loans in 1927, after deducting redemptions and sinking fund payments, totalled 1,081 million. This sum, a very large one for those days, consisted of 488 million for Europe, 301 million for Latin America, 149 million for Canada, and 143 million for the rest of the world. New long-term (net) dollar loans to Europe in the following year of 1929 were 311 million dollars.

The distribution of these net dollar loans within Europe is not without interest. The bulk of this investment went to the former Central Powers, Scandinavia, and Italy. For example, during 1927 and 1928 Germany. Austria, and Hungary together received an annual average of 218 million in new net dollar loans; Sweden, Norway, and Denmark obtained an average of 92 million; and Italy received 80 million.

Of course, these dollar loans comprised only one of several long-term capital movements. Americans were investing abroad in other ways, such as buying sterling securities, repurchasing United States bonds and stocks from foreigners, and by

purchasing mines and factories abroad. There was also a large counterflow of foreign funds to the United States. However, the new dollar loans were the most important single capital movement because of their absolute magnitude and subsequent decline.

TABLE 17
SHIFT IN U. S. LONG TERM CAPITAL BALANCE BETWEEN 1928 AND 1930 (in millions of dollars) \*\*

	1928	1930	CHANGE
U. S. Investment Abroad			
Purchase of Foreign Securities	1700	1200	-500
Repurchase of American Securities	1000	800	-200
Direct investment abroad (net)	300	200	100
Redemption of debts owed abroad	100	100	-000
-			
Total	3100	2300	-800
Foreign Investment in U.S.			
Purchase of American Securities	1500	900	600
Repurchase of Foreign Securities	500	800	+300
Direct investment	100	0+	-100-
Redemption of debts owed U.S	400	300	-100
•			
Total	2400	2000	-400
Net long term capital outflow	700	300	400

To the nearest hundred million dollars. Source: Federal Reserve Bulletin, p. 415. July, 1931.

From 1919 to 1930 the annual average long-term capital outflow on account of dollar loans amounted to 570 million to the world as a whole with 244 million of this going to Europe, and during the latter part of this period Europe was paying back about two hundred million dollars a year in war debts. This long-term movement was reversed by the onset of the Great Depression. For example, from 1931 to 1934 the net inflow of capital funds on account of dollar loans from the world as a whole was 297 million, of which 177 million came from Europe. This represents a shift in the annual average of 421 million for Europe and 867 million for the entire world.

The change in the over-all long-term capital movements was less marked but is of more significance; it is illuminating to contrast 1928 and 1930, which were respectively the years preceding and succeeding the first stock-market crash.

The crucial shift is in the stock and bond purchases of Americans and foreigners. Americans bought 500 million dollars less of foreign securities and repurchased 200 million dollars less of their own, making a total reduction of 700 million dollars. Foreigners bought 600 million dollars less of American securities, but they repurchased 300 million dollars more of their own stocks and bonds, making a total reduction of only 300 million dollars for foreigners. In other words the onset of the depression retarded international security purchases of Americans more than it retarded those of foreigners. And this difference in slow-down amounted to 400 million dollars.

The sudden reversal of net dollar loans to Europe removed one side of the triangular system of capital transfers which had been maintained between Germany and the European allies (reparations); the European allies and the United States (war debts); and the United States and Europe in general (commercial loans). In addition, considering the broader relationship of the United States to the rest of the world, the total net capital exports of the United States had indirectly financed the United States merchandise-export balance. The American export surplus, which exceeded the one billion dollar mark in 1928, declined thereafter in sympathy with the decline in net United States investment abroad.

The decade before the Great Depression was a period of precarious equilibrium. The mechanism of international trade and investment was functioning temporarily on the strength of American lending. The United States was financing reparations, war debts, and her own export balance. Germany was able to borrow more from her former enemics than she ever paid in reparations. The difference was used to rebuild her merchant marine, to improve many of her towns, and to relend to neighboring countries. This was an equilibrium which could endure no longer than American investors would purchase new foreign security issues. By 1931 the end had most certainly arrived.

#### End of the Gold Standard

The system of international finance was laboring under great strains by the end of 1930 and began to break down in different parts of the world during the following year. The period was characterized by falling commodity prices, debt moratoria, and a complete collapse of the interwar gold standard. These momentous events ran their course in a few short but hectic years.

One striking aspect of the Great Depression was the very great drop in the prices of foodstuffs and raw materials. price declines in manufactured goods were slight in comparison. This differential price movement placed the debtor mineral and agricultural countries in an impossible payments position. Argentina, Australia, and New Zealand were forced "off gold" by 1929 or early 1930. All the South American countries. which had been borrowing so unwisely and so well from United States investors, found themselves in difficulties. The interest rates on these dollar loans often amounted to 6 to 8 per cent, and the money had seldom been employed in a really productive manner. In addition there was the problem of transferring pesos into dollars when the agricultural and mineral exports of these countries were selling at such low prices. Eight South American countries (Bolivia, Brazil, Peru, Chile, Uruguay, Argentina, Dominican Republic, and Colombia) defaulted in part or in full during 1931. Costa Rica, Cuba, and Paraguay followed suit in the following two years. Most of these countries felt compelled to institute exchange control in order to make the best use of the limited amounts of foreign exchange that they were able to accumulate from their exports.

The debt situation in Europe was equally unhealthy. Moreover, two additional complications soon became evident. The interwar périod was characterized by very large investments of short-term capital in the various financial centers; these funds were contractually mobile and could be shifted at very short notice provided that the exchanges could carry the traffic. The other complicating element was international tension resulting from French attempts to prevent a proposed tariff merger of Germany and Austria and the ultimate political union which this might entail.

French financial pressure on Austria contributed to the failure in the spring of 1931 of the important Credit-Anstalt Bank located in Vienna. The Austrian government attempted to cover the Credit-Anstalt's deficit with the proceeds of a loan which the French had agreed to support. However, France later attached political strings to her participation, and the necessary funds were belatedly secured from the Bank of England and the Bank of International Settlements instead. A standstill agreement was also negotiated between the Austrian banking system and its foreign creditors whereby the latter accepted a two-year moratorium. Partial exchange control was established by the Austrian government.

These events scared Americans and Western Europeans who had investments or deposits in Germany and Central Europe. Large withdrawals began to take place. The Reichsbank experienced a very heavy gold drain despite advances from the Bank of England, the Federal Reserve Banks, and the Bank of International Settlements. The Bank of France, which was the only European central bank in a position to make adequate gold advances, gave aid grudgingly and finally at a political price that the German government would not accept. In June of 1931 several of the largest German banks failed. A series of bank failures ensued throughout Germany, central Europe, and the Danubian Basin. Germany negotiated a standstill agreement with her varied creditors, established exchange control, and stopped payment on her short-term credits. fer moratoria were also arranged for Hungary (1931), Bulgaria, Greece, Austria, and Yugoslavia (1932), and Rumania (1933). An unparalleled era of frozen assets had set in.

President Hoover had contributed such aid as he could in

June of 1931, when he suddenly announced that the United States would postpone, for one year, all war-debt payments due to his government provided the various European nations would similarly defer their intergovernmental obligations. France in the end reluctantly joined the other governments in agreeing to this proposal. In 1932 the Lausanne Conference met to settle upon a course of action after the one-year Hoover Moratorium expired. The essential outcome of this meeting was that in exchange for a transfer of Reich bonds totaling less than a billion dollars in value, Germany was freed of all reparation obligations provided that a satisfactory settlement regarding war debts could be reached with the United States. No mutual settlement with the United States regarding war debts was in fact ever reached. Instead, relying upon the depression as an excuse, almost all the war-loan debtors defaulted. Great Britain made small token payments for a while and Finland achieved a transitory glory by paying in full for a number of years.

However, the effective removal of war-debt and reparation payments from the international situation did not prevent a series of disastrous central-bank runs during 1931 and the following years. It was known that British banks had borrowed at short term in New York and lent at long term to Germany and the other afflicted regions of central Europe. The British budget was out of balance, and the May Report predicted increasing expenditures for unemployment relief. Fears regarding the continued solvency of the Bank of England, which had been operating on rather slim gold reserves since 1925, became widespread, especially as it was rumored that financial circles in Britain had lost heavily in the preceding failures on the continent. The United States was willing to extend support only in conjunction with France. but the French government held back aid for a while in order to increase the political price which it could later demand. Finally the Bank of England suspended gold payments in September of 1931. The pound began to fluctuate widely in a downward direction.

At the time, the United Kingdom was the largest trading nation in the world, and the British market was of paramount concern to a number of food and raw-material exporting countries. Several of these countries, including Denmark, Norway, Sweden, and India, felt it more important to link their national currencies to sterling than to gold. The British action had a profound psychological effect in many scattered parts of the globe. Less than half the world still remained on the gold standard within a few weeks of the British suspension.

The United States maintained an unaltered relationship to gold for eighteen months longer. There were large gold withdrawals from America at certain times during 1931 and 1932, and at one time the Bank of France threatened to increase these withdrawals if the United States government did not accede to certain demands. However, this attempted blackmail did not succeed, and the United States emerged from these temporary crises with adequate gold reserves. In fact the long-run trend of gold movements was toward the United States. The dollar appeared to provide relative safety to short-term investors who had to deposit their accumulated funds somewhere.

The American departure from gold in March of 1933 was unnecessary and was on that account unexpected. President Roosevelt's inauguration, in the same month, was attended by widespread bank failures in the United States, and the President's first official act was to declare a "bank holiday." These domestic bank failures were quite unrelated to the international-payments position of the United States and were attributable to internal business depression and the peculiar structure of the American banking system. The emergency was due to a mass movement to convert bank deposits into dollar currency rather than to convert dollars into gold. In fact, gold reserves were larger in March of 1933 than at any time since Britain's suspension of gold payments. However, the new Administration immediately abrogated the gold clause and prohibited the export of gold except under license.

During subsequent months the United States government bought gold on the market at a price which was raised slowly to over \$34.00 an ounce. In January 1934 the dollar was officially devalued to 59.06 per cent of its former gold content, and a gold-buying price of \$35.00 per ounce went into effect. However, this did not "return the dollar to gold," as the Treasury would not freely sell gold at that price and all other restrictions on the holding and exporting of gold continued. The purposes of these various maneuvers were varied. The Administration had a theory that this would raise commodity prices (Chapter 28). It wished to stimulate American exports and deter imports. Possibly the Administration desired a bargaining weapon to use against other countries.

A World Economic Conference met in London in the summer of 1933. One of the principal subjects on the agenda was currency stabilization. Exchange rates were fluctuating violently and were consequently increasing the risks of international trade and investment. There was a general fear that the world was about to engage in a currency-depreciation race. with most of the leading countries thereby cutting the effective prices of their exports. Some countries were also known to favor increased currency depreciation as a protective device against imports. However, the Conference made no progress in this direction, largely because the Roosevelt Administration was unwilling to commit the dollar to any definite exchange rate. The United States government of the day did not have a definite economic policy and was more interested in domestic than international affairs—and without the United States any extensive return to the gold standard was impossible. One result of American isolationism was to strengthen the tendency of nations who were trading satellites of the United Kingdom to join the sterling group.

The only countries which remained on the gold standard after 1933 were France, Belgium, Holland, Switzerland, and Italy. These gold-bloc countries underwent extremely severe deflationary pressures. The prices of their exports appeared

disproportionately high when expressed in the devalued monies of other nations. And these prices could only be reduced. in the absence of a departure from gold, by a reduction in domestic costs. Naturally wage cuts were resisted by labor unions and unorganized workers alike. Only the bourgeoisie's fear of a runaway-price inflation blocked devaluation or suspension by the gold-bloc countries for the time being. But the handwriting was on the wall, and it could be read alike by big financiers and small-scale capitalists. Money withdrawals from the gold-bloc countries set in. One by one, currencies toppled. The belga was devalued about 32 per cent in March of 1935. France suspended gold payments in October 1936, and thereafter attempted to maintain some control over the depreciated franc by means of a newly created stabilization fund. Holland, and then Switzerland, suspended within a few days of the French action.

These four countries, together with the United States and Great Britain, thereafter adhered to the Tripartite Currency Agreement of 1936. Under this agreement each central bank daily informed the others of the price at which it would sell gold without limit for 24 hours. This procedure permitted each participating central bank to repatriate funds by means of gold, but at a cost which could be varied within a day by any nation suffering withdrawals.

The years immediately following 1930 demonstrated the inability of any country except the United States to survive an international run on its central bank. This inability stemmed from inadequate gold reserves and the enormous volume of highly liquid short-term capital which fled from one financial center to another in search of safety. Financial experts were accustomed to look upon these short-term capital movements as a stabilizing influence and believed that they could always be attracted to a center, which was otherwise losing funds, by raising the interest rate in the domestic money market. This may be true in stable times, but during economic depressions, short-term capital movements have an opposite effect. Ac-

cordingly, a number of governments limited the right of withdrawal, and in a few countries rigorous exchange control was already in force by the end of 1931.

#### Resurrection of Mercantilism

As the Great Depression deepened during the early 1930's, it gave birth to a new mercantilism, or economic nationalism, more intense and virulent than any known to Adam Smith or the free traders of former centuries. The political survival of governments was threatened by continuous unemployment. A number of debtor countries found themselves quite unable to make international payments to which they were committed. Increased protection against imports, and control over the purchase of foreign exchange frequently resulted.

The decade was opened by an unfortunate action on the part of the United States government. In 1930 Congress revised the American tariff sharply upwards. The Hawley-Smoot tariff of this year was largely the outcome of political pressures exerted by special interest groups in the United States. Its relationship to international economic life was certainly not the primary concern of those who "log-rolled" it into its final form. President Hoover refused to veto the bill although a substantial majority of leading economists in the country petitioned him to do so. The Hawley-Smoot Tariff Act dealt a body blow at international trade at the very moment that the growing business depression began to undermine it. This Act gave the United States the dubious distinction of simultaneously being one of the world's primary creditors and having one of the world's highest tariffs.

The lengthening list of countries with depreciated currencies provided a new excuse for tariff protection in the countries not so affected. The agricultural exports of Argentina and Australia were selling at extremely low prices in Europe after 1930. This was partly due to falling prices throughout the world for most primary products, but also to the departure of these exporting countries from the gold standard. A number of Europe

pean nations also went "off gold" in 1931 and allowed their currencies to depreciate. This meant very stiff import competition for domestic producers in the remaining "strong" currency nations, as the effect of depreciation by a foreign country was to lower the protective force of domestic tariffs. Accordingly, a number of governments imposed special-duty rates on imports entering from countries with depreciated currencies. Not infrequently this instigated tariff retaliation.

France and a number of other countries having a large peasant population found themselves in a particularly difficult situation. In order to maintain social balance, these countries had long granted their home agriculture a moderate degree of protection from the mechanized and extensive farming of the overseas temperate belts. Falling prices and the depreciated currencies of exporters threatened to exterminate their peasantry under a flood of cheap food imports. The French government did not dare resort to a devaluation of the franc because of a political antipathy toward any monetary measures that might ultimately usher in a disastrous inflation. Tariff action suffered from the defect of promising to be always too late. The franc price of food imports was steadily falling so that a tariff which provided sufficient protection today might prove inadequate tomorrow. In fact, the act of raising the tariff might serve to lower the net prices which foreign food exporters would be willing to accept. Tariff rates of over 100 per cent would often have been required to keep imports throttled down to a normal volume. The psychological effect of such high rates on foreign countries would have been most unfavorable. Also, in a number of cases existing duty rates were "bound" by commercial treaty. For these various reasons a number of nations imposed additional import controls of a quantitative nature.

Import quotas limit the total physical quantity of imports by classes of commodities. Falling export prices abroad and depreciating foreign currencies cannot increase the volume of imports if the quota is already filled. Austria, Czechoslovakia, and Hungary were making use of this kind of restriction before the end of 1930. The periods in which the more important trading nations made a systematic use of import quotas are as follows:

1931-Belgium, France, Spain, and Turkey

1932—Eire, Germany, Netherlands, Poland, Rumania, and Switzerland

1933-Bulgaria, Greece, Netherlands East Indies

1934-India and the British Colonial Empire

Italy, Japan, and New Zealand followed the lead within the next few years. Also a great many other countries, including the United States to a limited extent, made increasing use of import quotas as a method of trade control.

Unfortunately, the import-licensing system, which is usually associated with import quota regulations, is extremely complicated and leads to bureaucratic regimentation of the worst kind (Chapter 16). During the ensuing years, a number of countries also entered into secret agreements by which each promised the other a larger share in its total import quotas. These furtive bilateral negotiations hastened the degeneration of commercial policy.

It has already been mentioned that many of the countries that experienced balance-of-payments difficulties and subsequently depreciated their currencies imposed exchange control.

In 1931 systematic exchange control was imposed by Argentina, Brazil, Spain, Germany, Hungary, Chile, Uruguay, Colombia, Greece, Czechoslovakia, Bolivia, Yugoslavia, Austria, and Denmark. In no other year were there so many additions to the list. About sixty jurisdictions (almost the entire world) undertook exchange restrictions of some kind during the 1930's.

The essence of exchange control is that the individual may not purchase foreign exchange without the permission of his government and must use the foreign exchange for the purposes stated in his license application. Although originally established to check outflows of panic capital, exchange control soon came to be employed by governments as a means of regulating imports. Permission to purchase foreign exchange would not be granted if the government did not favor the commodity import or the exporting country in question. Exchange control presented governments with an opportunity to discriminate among products and nations to an extent previously unknown.

These discriminatory possibilities increased the extent of bilateral negotiations between governments on behalf of their producer interests. These usually resulted in what might be termed mutual back-scratching agreements with each nation undertaking to facilitate the purchase by its own nationals of some commodity export of the other. Thus Belgium agreed to take pit props from Norway if Norway would purchase more coal from Belgium. A number of nations agreed to finance part of the expenditures of foreign tourists in their country in exchange for needed imports: thus, in 1935 Germany promised Switzerland coal supplies in exchange for subsidizing German tourists on holiday in Switzerland. Commercial diplomacy during the 1930's was often little better than a faintly disguised system of bilateral bartering.

Meanwhile, beginning in 1932 the United Kingdom departed from its traditional policy of free trade and imposed moderate but extensive tariffs on non-Empire imports. In the same year at Ottawa, arrangements were made to establish imperial preference amongst the self-governing members of the British Commonwealth. These preferences were created by raising tariffs on foreign goods rather than by lowering duties on Empire trade. Thus, the over-all effect of the Ottawa Agreements was to concentrate trade within the Empire to an abnormal extent and further to restrict world trade.

These and other developments tended to nullify the effectiveness of the most-favored-nation (or equal-treatment) clauses to be found in so many commercial treaties. The preferential rates within the British Commonwealth did not have to be extended to foreign powers, as technically they

were available only to governments with an allegiance to a common Crown. Nor could the many furtive bilateral agreements made regarding the administration of import quotas and the rationing of foreign exchange be readily generalized or brought within the scope of most-favored-nation provisions.

Many governments subsidized exports to an ever-increasing extent. Since World War I Britain had insured exporters in certain lines against trade risks; however, the scope and coverage of these guarantees were subsequently augmented. The United States authorized subsidies on exports of wheat in 1934, and increased the subsidization of its ocean merchani marine in 1936. A number of South American countries attempted to stimulate their exporters by purchasing the foreign exchange which they obtained thereby at a preferential price. After 1935 Germany operated an ambitious and secret scheme under which a turnover tax was imposed upon industrial production in order to compensate firms quoting low prices to obtain export sales. However, subsidization of exports was usually regarded as a form of dumping by the governments of the countries to which such exports were sent, and the latter often imposed special anti-dumping duties to offset such subsidies.

The latter years of the interwar period also witnessed the rise of administrative protection. There are many ways in which a government can discourage imports. It may delay the assessing of duties or damage merchandise during inspection; it can compel customs clearance at remote frontier points. Commercial travellers for foreign firms may be harassed, and their samples subjected to specially high taxes. Freight rates from frontier stations and harbors may be increased in order to deter imports, whereas rates in the opposite direction are lessened to encourage exports. Propaganda may be spread against foreign goods, and this antipathy may be focused by requiring the country of origin to be designated on each separate article.

Governments are increasingly important purchasers of supplies on their own account. State purchasing agents are usu-

ally instructed to buy home produce exclusively or at least to give it a preference. This is an important point when one considers that most European governments operate the railroads and all public utilities. Moreover, for their size, European countries have normally maintained extensive military establishments as compared to a power like the United States.

Some idea of the impact on international trade of the depression during the 1930's and the controls it engendered can be obtained from the following statistics. The total quantity of world trade was 15 per cent less in 1935 than in 1928. prices were down 30 per cent on the average, and the total value of merchandise trade had fallen 41 per cent during the same period. The enormous fall in values indicates the hardships under which debtor countries, which had previously discharged their liabilities with export balances, were forced to labor. may seem surprising that the physical volume of merchandise trade in 1935 should be as high as S5 per cent of the 1928 quantity, but it should be recalled that trade channels were often shifted rather than severed by the preference schemes and bilateralism of the period. The new trade pattern involved a partial sacrifice of comparative advantage in many cases, and this loss in economic efficiency doubtless increased real costs per produced unit for the world at large.

## Preparation for War

After 1935 it became increasingly evident that the German government was using its economic controls to increase its military strength and prepare for war. Before this date the major emphasis had been on public works and increased exports in order to reduce unemployment and general discontent. However, as the rearmament program got under way, all this was changed. The unemployment slack was soon taken up as men entered the munitions and aircraft industries, the Todt organization, and the armed services. These developments brought about a significant change in the international economic policies of the Third Reich.

The German war effort required an enormous increase in the

volume of imports. The steel industry needed iron ore, nickel, manganese, and many other of the special poundage metals. While attempting to achieve eventual self-sufficiency with synthetic rubber and petroleum, the German government wished in addition to import these commodities for stockpiling. An effort was also made to build up reserves of imported cotton, wool, and grains. The Nazi administration wished to pay the lowest possible price in exports for these necessary imports, as it did not want to divert manpower and materials from the domestic rearmament program.

A complicated system of exchange control was the principal means whereby Germany's foreign trade was regulated for the expansion of the military establishment. First, exchange control was used to ensure the importation of commodities needed for the war effort rather than for mere civilian enjoyment. Germans were told during these years to choose between guns and butter. The meaning of this notorious dictum was that the limited foreign exchange available to Germany was to be used to import iron ore from Sweden rather than butter from Denmark. Second, exporters of goods to Germany were paid in a number of different kinds of marks, each of which could only be used in specified ways; Germany's foreign trade came to be carried on in what amounted to a dozen or more different mark currencies, all of which were in effect earmarked to be used only for certain purposes. One of the results and obiectives of this complicated scheme was to depress the prices that Germans paid for imports. The foreign exporter, by the time he had finally managed to extract some goods from the German economy in return, usually found the deal less profitable than he had anticipated. Third, exchange control was used to build up sources of supply for Germany in the adjoining countries. It was realized that if war did break out with Britain and France, overseas imports would be shut off by blockade. Therefore, an attempt was made to have neighboring neutrals and satellites expand their food and raw-material production. This was accomplished through buying heavily from them before the war, guaranteeing continued purchase, and paying for

these imports, at least for a time, with the more useful kinds of reichsmark. In later years favorable bargains were "negotiated" by Germany with the aid of military threats.

German exchange control also prevented the incipient German inflation from leading to large imports for consumption purposes. The manner in which war preparation was financed led to a great increase in money circulation, and the rearmament program itself reduced the domestic production of certain consumption goods. Prices tended to rise despite the early enactment of price ceilings. The German public would have imported food, clothing, and durable consumption goods if it had been allowed to buy foreign exchange for that purpose. However, as matters stood exchange control served to ration goods to the German public, as imports were their last means of acquiring many civilian goods.

Prior to 1939 few of the economic controls developed by the Nazi government were used by other leading European powers except Italy. Great Britain and France, although beginning to rearm in 1938, continued to hope that war could be averted. Moreover, at that time public opinion in these countries would not have tolerated such rigorous government intervention in private affairs as was prevalent in Germany. Only after the actual outbreak of war did the Western Allies, besides taking a number of pages out of the German book on foreign trade and exchange control, add a few of their own.

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# PART II INTERNATIONAL ECONOMIC ANALYSIS

## Chapter 4

# International Accounting

HE basic classifications into which a nation's foreign transactions fall are shown in the statement of its international accounts or balance of payments. By studying these classifications at an early stage of this book, the reader obtains a glimpse of the organic character of the whole subject matter of international economics. The different categories of transactions, ranging from merchandise trade to financial payments and receipts, have only one common denominator: they can be expressed, if necessary, in a single-value figure. By studying the value figures that can be ascribed to different classes of transactions, noting how they are related to other classes and how each or the total of these separate classes behaves through time, the informed observer can draw useful conclusions concerning a country's international economic position. This chapter discusses the significant classifications of balance-ofpayments accounting. In a subsequent chapter, we shall take up the more involved matter of balance-of-payments analysis.

## Constituents of the Balance of Payments

(Balance of payments must be sharply distinguished from balance of trade. The latter is simply the difference between the value of merchandise exports and the value of merchandise imports.) In and of itself, the balance of trade has no analytical significance, as will be shown in a subsequent chapter. (However, the trade balance is usually the largest component of the balance of payments. The other major components of the balance of payments are the payments to, and receipts from,

the world on account of shipping services; tourist services; financial services; government expenditures; gold movements; and short and long-term international capital movements.) The foregoing items include all of a country's international transactions, which are summarized in the statement of its balance of payments.

#### Credits and Debits

(For purposes of balance-of-payments accounting, the established procedure is to use some of the terminology of doubleentry accounting. Thus a balance of payments is drawn up in terms of debit and credit entries.) The reader should be cautioned, however, that there is no exact parallel between the meaning of these terms in balance-of-payments terminology and in ordinary double-entry bookkeeping. With respect to the balance of payments of the United States, all international transactions which give rise to foreigners' money claims on the United States are debit transactions, or in short, debits. ilarly, all international transactions giving rise to money claims of Americans on foreigners are credit transactions, or in brief, credits. Thus, a moment's reflection will indicate that the most common credits of the United States are exports of merchandise, and conversely, that the most common debits of the United States are imports of merchandise. The reader may see this for himself by inspecting the statement of the American balance of payments for 1939, on the opposite page.

This balance-of-payments statement consists of three major parts: current transactions, gold movements, and capital transactions. We need not concern ourselves at this point with these parts, but it may be appropriate to discuss briefly some of the leading features of the United States balance of payments in 1939. Among the current transactions, merchandise trade credits (exports) bulked largest, totalling 3,177 million dollars. The next-largest current credit was that of interest and dividend receipts, at 541 million dollars. On the debit (import) side, merchandise imports totalled 2,318 million

#### United States Balance of Payments in 1939 c (in million dollars)

Current Transactions	Debits	Credits
Merchandise trade	2,318	3,177
Other current transactions	-,	-,
Shipping and freight	367	303
Travel expenditures	290 .	135
Personal remittances	144	36
Institutional contributions, net	43	
Interest and dividends	230	541
Government aid and settlements	18	2
Other government items	81	42
Silver	91	14
Miscellaneous adjustments and services, net		64
Gold Movements		
Net gold exports or imports	3.574	
Net change in earmarked gold		556
Capital Transactions		
Long-term capital movements		
Net flow through change in United States assets		
abroad		113
Net flow through change in foreign assets in United		
States	86	
C1		
Short-term capital movements		
Net flow through change in United States assets		211
abroad		211
Net flow through change in foreign assets in United States		1,259
** **		789
Unexplained items		789
	7,242	7,242

<sup>&</sup>lt;sup>2</sup> Source: Rearranged from The United States in the World Economy, p. 216. Washington, D. C.: Department of Commerce, 1943.

dollars; next in rank among the current transactions was shipping and freight payments, at 367 million dollars. The other current items are to be interpreted in the same manner.

Although we shall refer to gold and capital items below, it may be remarked at this point that the large debit of 3,574 million dollars, representing net gold imports into the United States in 1939, was the product of extraordinary world political upheaval and war. It seldom happens that net gold imports are of such large relative magnitude. We may comment,

finally, on the category in the United States balance of payments for 1939 which is labeled unexplained items. As the term itself suggests, this category, amounting to 789 million dollars, covers transactions for which no specific accounting can be provided. It is calculated statistically by the very simple process of equating credits to debits, but in reality it consists mainly of unreported short-term capital transactions and errors in the valuation of trade items. However, we shall have more to say about such matters at a subsequent point.

To return to credits and debits, a simple rule to follow in connection with the classification of transactions as between these two headings is to associate credits with exports from the United States of merchandise, shipping services, and so on, and to associate debits with the imports by the United States of merchandise, shipping services, and so on. The following enumeration of typical credits should be helpful. (The opposite transactions would be balance-of-payments debits.)

## Typical credits

Exports of merchandise

Foreign tourist expenditures in the United States Ocean and air transport services rendered to foreigners Banking and insurance services rendered to foreigners Interest and dividends received from foreigners Emigrant remittances

Foreign government expenditures in the United States Imports of capital

- 1. Long-term capital
  - a. New American securities sold to foreigners
  - b. Foreign direct investments in the United States
  - c. Sale to foreigners of outstanding American securities
- 2. Short-term capital
  - a. Increase of foreign-owned bank balances in the United States
- b. Reduction of American bank balances abroad
  Exports of gold
  - 1. Physical export of the metal
  - 2. Reduction in American gold on earmark abroad
  - 3. Addition to foreign gold on earmark in the United States

A word of explanation is necessary concerning some of the above credit transactions. Expenditures by foreign tourists in the United States should present no difficulty, as our money claim on foreigners results from the sale (export) to them of American scenery, hotel and transportation services, and so on. Similarly, there should be no difficulty in the case of the "export" of ocean and air transport services, and banking and insurance services. Interest and dividends received from foreigners are also easily classified as credits, since such payments are made in return for services derived from American capital invested abroad. Alternatively, the reader might visualize interest receipts in the form of the export from the United States of bond coupons and dividend receipts as the "export" from the United States of legal claims on declared dividends. Emigrant remittances represent money transfers to relatives and friends in the United States of Americans who have migrated to foreign countries. To stretch the point somewhat, we may say that the United States exports to such Americans abroad the equivalent of the sums spent on goods and services consumed in the United States by their relatives and friends. (Emigrant remittances are inconsequential in the balance of payments of the United States. Rather, remittances generally move in the opposite direction, from individuals in the United States to relatives and friends abroad. Such remittances of course are classified as immigrant remittances). Foreign-government expenditures in the United States are analogous to emigrant remittances: the United States exports to such foreign governments the equivalent of sums spent on goods and services consumed in the United States by the representatives of foreign governments.

Imports of capital represent the only important category of imports giving rise to balance of payments credits. Does this statement constitute an exception to the rule, mentioned above, that American exports are credits and imports are debits? At first glance such would appear to be the case; actually it is not. When the United States imports long-term

capital, foreigners acquire American stocks and bonds, acquire title to physical property located in the United States, and so on. In terms of the rule that export transactions are credits. the reader might find it helpful to substitute for the expression foreigners acquire American stocks and bonds, the expression the United States exports stocks and bonds-that is. the United States exports the securities (or they are left physically in the United States, but in a foreign account) on the one hand, and on the other hand the foreigner draws a check in favor of the American owner of the security (or in favor of the issuer of the security if outstanding securities are not involved). The case thus results in an export from the United States and also in a claim on foreigners. Short-term capital transfers are substantially the same. We import short-term capital when foreigners increase their balances with American banks or when we reduce our own balances with foreign banks. In both cases our claims on foreigners increase; in the first case we are entitled to more of their currency, whereas in the second case we are entitled to more foreign-owned dollars.

Exports of gold are the same as merchandise exports as far as the accounting aspect is concerned, but a word should be said about the earmarking of gold. Earmarking is the procedure by which title to or ownership of gold is transferred from country to country, or from bank to bank, without any physical movement of the metal. For all practical purposes we may say that central banks are the only institutions which engage in the earmarking of gold. The Federal Reserve Bank of New York, for example, engages in earmarking operations almost every day. If it receives cable instructions from, say, the Bank of England to transfer X ounces of the latter's earmarked gold to the Bank of France, virtually all that is involved is a bookkeeping operation. The Bank of France then would have title to a larger, and the Bank of England to a smaller, fraction of the gold in the vaults of the Reserve Bank. Earmarking gold is the cheapest way of making effective transfers of the metal, since costly shipping and insurance charges are avoided.

## The Balance of Payments as a Whole

Having explained the nature of credits and debits, it is now necessary to discuss the relation between a country's total credits and total debits. The basic relationship is a simple one. The credits must equal the debits. This equality arises from the fact that international borrowing or lending occurs whenever a country's current payments exceed or fall short of its current receipts. (International borrowing or lending occurs as a balancing factor, automatically or as part of the international exchange process, if the other items in the balance of payments do not balance.) It occurs automatically in the same sense that an individual's accounts are kept in balance. If an individual happens to be spending more than his current earnings, he can do so only by "borrowing"—that is, by drawing on his past earnings or by formal borrowing. He could not otherwise engage in the volume of current spending effected by him. Formal borrowing includes, it may be added, the lengthening of credit terms offered to him by his suppliers. The fact of the matter, therefore, is that an individual's accounts, as well as those of a nation, are always in balance in the sense that credits equal debits. The fact of balance does not, however, carry with it any independent meaning. In and of itself, balance does not indicate, for instance, whether any given situation is "good" or "bad."

#### Some Matters of Classification

We need not linger long over the equality of total credits and total debits, since this equality is a necessary and "natural" attribute of the balance of payments. We must instead go behind the feature of balance and concern ourselves with the relations between the various component credits and debits. In devoting our attention to component items of the balance of payments, however, we cannot concern ourselves with minute details about the million-and-one foreign transactions. To do so is to risk not seeing the forest because of the attention

devoted to individual trees. We must group closely related transactions into a relatively small number of classes so that the features of each class as a whole are similar to the features of the items within each class. This is a problem in classification.

Concretely, we speak about merchandise trade instead of tooth picks, phenolic resins, and turbine generators, and the discussion is in terms of payments for and receipts from tourist services instead of conducted tours, hotel bills, and train and airplane fares. Similarly, we group diverse items into such convenient classes as interest and dividends, banking and insurance, personal remittances, and so on. The result is a set of classes which have become standard terminology in the study of balances of payments.

The categories mentioned in the preceding paragraph are composed of items currently being transacted, or stated differently, the categories comprise transactions in current goods and services. Collectively, current transactions make up what is called the current account of the balance of payments. The reader may wonder, however, why some of the items discussed in the preceding paragraph are classified as current. He can readily account for merchandise trade, tourist (travel) services, and the like, but he may find it difficult to understand why interest and dividends are lumped together with current transactions. The answer is that interest and dividends represent payments for financial services, the borrower paying the lender (in the case of interest) for the services currently rendered by the capital which has been borrowed. Whether interest payments are required to be made under the terms of a contract is immaterial to the question of classification for balance-of-payments purposes. Dividends similarly represent payments made in connection with the current services of capital. An alternative and negative way of putting the matter is to say that interest and dividends do not logically fall into any account other than the current account of the balance of payments.

In this connection we may consider a mode of classification of current transactions which is used in some publications. This is the classification of transactions into visible and invisible trade. The items of merchandise that pass before customs officials at ports of entry are labeled visible, whereas services rendered on the high seas, in ports, or in foreign countries give rise to invisible transactions. This distinction is helpful in some cases, but it has its limitations. First, few countries consistently classify transactions on such a basis. Such glaringly visible transactions as those involving the transfer of ocean steamers, for instance, are frequently classified as invisible trade. In the second place, the distinction is purely superficial, without analytical significance. A nation's international economic relations do not consist of trade or of services alone, but rather of the two in varying combinations. follows, therefore, that a comparison of credits and debits relating to visible trade (that is, the balance on current visible trade) tells an incomplete story with respect to a nation's current transactions, and tells nothing about the longer term. The invisible trade will also have to be considered before any conclusions can be drawn concerning its over-all current trading situation. But the visible trade plus the invisible trade only adds up to the current account. Clarity of thinking is served if the discussion is conducted directly in terms of the meaningful category of current-account transactions.

This short discussion of classification problems may be brought to a close by considering capital and gold transactions. These are the financial items proper of the balance of payments. Capital transactions are of two types, each with its own significance for balance-of-payments purposes (as will be explained fully in a subsequent chapter). If the Export-Import Bank of Washington extends a 30-year loan to Brazil for the purpose of financing the construction of a steel mill, the transaction is classified as a long-term export of capital by the United States. The United States has agreed to tie up funds for many years, in return for Brazil's promise to make annual

interest payments and to amortize the loan. The other type of capital transaction is represented by the short-term movement of funds between countries. These funds may move either to take advantage of differences in interest rates or, more generally and basically, to serve as a balancing item in the event that a nation overbuys or oversells on current account. (Overbuying and overselling is here used to mean buying or selling not associated with the importation or exportation of long-term capital. The whole matter is discussed at length in a later chapter). For example, when we spoke earlier in this chapter of the manner in which a nation's balance of payments is kept in balance, we were referring to borrowing and lending that is technically known as a short-term movement of capital. Gold movements, it might be added, typically perform the same function as short-term capital movements. That is why gold for balance-of-payments purposes is treated as money rather than as another commodity. Gold has traditionally been used by most nations as their basic international monetary reserve.

## What the Balance of Payments Reveals

(The balance of payments, as a periodic quantitative summary of a nation's international transactions, can be used to reveal a number of features of a country's international economic life.) In the case of a young and relatively undeveloped country, for instance, the balance of payments will show important aspects of the way in which its development is linked financially with capital-supplying countries. Or take the case of an old country which has far-flung foreign investments. Although many of its citizens may be familiar with the fact that the country's earnings on foreign investments are an important source of income, the balance of payments conveniently summarizes the situation in quantitative terms. A statement of the country's international accounts in this case can show the extent to which its citizens are living off past ex-

ports, or the balance of payments may be used to reveal how some countries live off tourists, shipping services, and so on.

Most important of all, however, is the role of the balance of payments in the study of the changing international economic position of a given country. The balance of payments, as a set of relations, is an economic barometer which, in the hands of persons trained in the art of economic analysis, can be used to appraise a nation's short-term international economic prospects, to evaluate the degree of its international solvency, and to determine the appropriateness of its exchange rate or the value of its monetary unit. But more about these matters in a subsequent chapter.

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## Chapter 5

# National Specialization and Production

ATIONAL specialization in production is one of the outstanding facts of economic life. One expects individual enterprisers to specialize along specific lines, but it is remarkable that so many of the concerns making watch movements are located in Switzerland and that so many wool growers are in Australia. This spatial concentration is all the more surprising when one considers that transportation costs are constantly working in the opposite direction towards local selfsufficiency and short distribution lines. There would be even more national or geographic specialization if there were no transportation costs. The only possible inference is that this kind of specialization is based on overwhelming economies of production. There are a number of reasons why specific regions can produce certain articles at abnormally low cost. Sometimes climate is a major element; the availability of a productive factor is often another reason. These and a host of minor considerations will now be examined in detail.

#### Climate

Climate obviously has an important bearing on the production costs of almost all agricultural commodities and a number of manufactured goods. This is so patent a fact that little need be written in elaboration; indeed, climate was one of the first aspects of geographic specialization to be seized upon by earlier economists.

Temperature and rainfall are the two most important climatic elements so far as international trade is concerned. In

this case it is not only the average degree of temperature throughout the year that matters, but also the variation and timing of these changes. The same is true of rainfall.

For example, cereals can be grown at high latitudes having a low mean annual temperature if there is a sufficiently long growing period free from killing frosts. Wheat also needs a reasonable amount of rainfall during most of the year, but ripens best under dry conditions. Rice, on the other hand, does best with more continuous warmth and dampness, and for this reason it is more abundant nearer the tropics than elsewhere. A damp and hot climate is necessary for the production of tree rubber. Most fruits and vegetables prefer a "Mediterranean" climate, which is cool and damp some of the year and hot and dry during the remainder. Citrus trees cannot live in regions of frequent frosts. Forest products come from areas having a high rainfall. Indeed, all agriculture is so dependent on the temperature and rainfall characteristics of a region that an economic geographer can deduce a country's climate from its vegetation.

Climate is also important in lines of production other than agriculture. Lancashire, England, was long an important center of cotton spinning because the damp air caused the cotton fibers to bind more tightly. One of the reasons that southern California became the home of motion pictures was that in the days of "silents," when nearly all pictures were made outdoors, almost every day was sufficiently sunny for "shooting." Factories do not have to be so well built in temperate as in zones of extreme variations in climate, and they can sometimes be in part dispensed with where the weather is normally dry. For example, some of the assembly work on aircraft in the Los Angeles, California, area, at least during the war, was performed outdoors. On the other hand, extreme climates usually increase production costs simply because employees must be given comfortable working conditions if they are to work efficiently.

Differences in climate were an especially important basis of

international trade several centuries ago. The famous spice trade of the Middle Ages, which brought cinnamon and nutmeg, among other rarities, from the East to Europe, would not have existed had the western climate permitted their growth locally. The British Isles, before the Napoleonic Wars, was a large importer of wines from the warmer regions of southern Europe. In the past the cooler temperate regions have relied on the tropics for sugar, coffee, and rubber; and on the intermediate zone for tea, cotton, and tobacco.

However, climatic differences, although still a potent force, are becoming a less important basis of international trade. First, new strains of familiar vegetable products that are adaptable to a wider climatic range are constantly being developed.) For example, new types of wheat that have a very short growing season can now be raised at high altitudes. Beet sugar produced in temperate zones has been substituted for much of the cane sugar grown nearer the tropics. (Second, certain aspects of climate can be modified by human ingenuity. and often at low enough cost to prove practicable. Where climate does not provide rainfall it is often possible for engineers to provide irrigation.) This has been done, for example, in parts of Palestine with great success. Cotton spinning can be performed in dry regions if proper air conditioning is installed. (Third, many natural products are and can be replaced by other materials.) Synthetic rubber may be able to replace tree rubber, even on the basis of competitive costs. Fibers such as cotton, silk, and wool are being in part superseded by rayon, nylon, and eventually perhaps by spun glass and steel. The lighter metals are competing ever more successfully with wood for building purposes and for furniture.

Some of these new processes and products are admittedly in their infancy. The scientifically advanced nations of the world, however, are now on the threshold of a technological revolution which will introduce many synthetic products still only in the laboratory stage. These synthetic goods will partially replace many of the natural products upon which man

has relied for centuries. Development of new products will have tremendous repercussions on international trade. Natural products are in the main tied to localities that have the requisite climates. Synthetics, on the other hand, can usually be made wherever there is power, and from raw materials that are universally available.

(Nevertheless; climatic influences will remain an influence to be reckoned with in international trade. The cost of most food production will still be strongly affected by climate. A favorable climate increases the output-to-input ratio of any agricultural enterprise, and this naturally results in a lower cost per unit of output unless the prices paid for the inputs are abnormally high. Production of any good tends to be concentrated in regions and nations that have especially low costs of production because producers there can quote low prices to meet competition. Regional or national specialization and international commodity trade depend on these simple facts.)

#### Factor Supply

Another powerful basis of national specialization lies in the relative abundance of certain productive factors in some nations and their comparative scarcity in others. This variation in factor supply brings about cost differences, which in turn occasion specialization. However, there are a number of intervening links in this causal chain which need to be provided and explained.

#### Two contrasting closed economies

For the sake of immediate discussion, let us imagine a very simplified case of two nations, which produce two commodities with the aid of two productive factors. One nation we shall call *Argentina* and suppose that it has a very low ratio of labor to land. The other nation we shall call *Belgium* and assume that it has a very high labor-to-land ratio. The people of these two nations consume meat (the production of which re-

quires much land) and vegetables (the raising of which requires much labor). What would the situation be within each of these two nations if they were completely isolated from one another and if no trade existed between them?

## Argentina

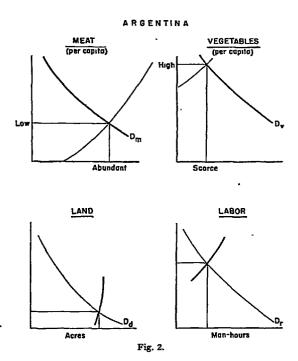
In Argentina the diet will run to meat rather than to vegetables despite consumer preferences and simply because of the relative abundance of meat and scarcity of vegetables. In fact, consumers will become so tired of this extraordinary diet that they will pay only a low price for meat, whereas the rarity of vegetables will cause people to pay a high price for them (Upper Diagrams, Fig. 2). Fundamentally, this state of affairs results from abundant land and scarcity of labor coupled with the fact that meat production requires more land than labor and that vegetable growing requires more labor than land. These are all circumstances largely beyond the immediate control of the population.

The price (or rent) of land will be abnormally low in Argentina whereas the price (or wage) of labor will be exceptionally high. This is due to both supply and demand conditions in each of these two markets (Lower Diagrams, Fig. 2).

Let us consider first the case of land, and assume that this is all of uniform quality. The supply schedule for land is virtually inelastic unless we take into account the meager possibilities of reclamation and the like. The position of this schedule is relatively far to the right simply because Argentina has a great deal of land. The demand schedule for land is based on two elements: one is the demand for the things which land helps to make—that is, meat and vegetables; the other element is the physical productivity of an extra acre of land in making these final consumption goods. When finished goods are sold under conditions of pure competition, the demand for land or any other factor is based on its marginal physical productivity times the price of a unit of output.

Marginal physical productivity varies according to the prin-

ciple of variable proportions. This is an exceedingly important element of economic theory. In any enterprise various factors of production are combined together. Perhaps a



little labor will be combined with a great deal of land as for example, in the case of four workers to 3.000 acres, or a great deal of labor may be combined with a small area of land, as for instance 120 workers with 15 acres. The addition or subtraction of a worker will have a much greater effect on physical output in the first case than in the second. On the other hand

the addition or subtraction of an acre of land would hardly be noticed in the first case, but would significantly alter production in the second. (This is similar to the situation at a dance where there are a great many girls and very few men. The arrival of an extra man will really contribute to the success of the dance, but it will not make much difference if one of the girls becomes disappointed and goes home.) The rule is that in any given line of production the marginal physical productivity of one factor becomes greater when it is combined in smaller proportions with other factors.

The rent of an acre of land in Argentina is low. In part this is due to the poverty of its marginal physical product, which is in turn based on the high proportions in which it is combined with labor. Enough labor to work an extra acre adequately simply is not to be had. However, the low rent of land is also caused by the state of the markets for meat and vegetables. Most of the demand for land comes from the demand for meat because ranching takes so much more land than truck gardening, and the price of meat in Argentina is very low. A low physical yield and a low price for the chief output make for a low land rent.

We can now consider the labor market in Argentina. In the main the supply schedule is high in recognition of this nation's small population (Lower right Diagram, Fig. 2), but it is not absolutely vertical. At higher wage rates more manhours of labor will be supplied, either by people working longer or by a larger fraction of the population seeking jobs. A strong demand for labor exists. Employers are willing to pay high wages because any extra labor is worth a good deal to them. This high value is due to two elements: labor is always combined in such low proportions with land that its marginal physical productivity is high, and most of the demand for labor is derived from the demand for vegetables, and these last are selling at abnormally high prices. Wage rates are therefore high.

The entire position in Argentina may be summarized. There are four markets and eight schedules. Four of these schedules, the two product demands and the two factor supplies, provide the setting for this problem in regional economics. Somehow the normal demands for meat and vegetables have to be reconciled with the abnormal supplies of land and labor. This fundamental situation is reflected in the other four schedules. For example, the demand for land is derived mostly from the demands for meat and vegetables, and so is the demand for labor. On the other hand, the supply of meat is partly based on the supplies of land and labor and so is the supply of vegetables.

### Belgium

The situation in Belgium could be represented in a separate figure. Demand schedules for meat and vegetables, although the same per capita, would lie to the right because of the relatively large population. The supply schedule for land would lie to the left, and that for labor to the right, as compared with Argentina. The meat-supply schedule would tend to lie to the left because of the relative scarcity of land; and the vegetable supply schedule to the right, because of the comparative abundance of labor. As a consequence in Belgium one eats mostly vegetables with meat on the side rather than the other way around. Meat prices are high and this serves both to ration the limited supplies and to encourage increased production. Vegetable prices are low.

Land rents are high in Belgium. In part this is due to the relatively small supply. High land rents are also based on the fact that an extra acre of land is worth a great deal to any farmer or rancher in this area. Land has a high marginal physical output because, in Belgium, land is always combined in relatively small proportions with labor, and this enhances the productive significance of each acre. This last statement is true of course in only an average sense and in contrast to

Argentina because the ratio of land to labor, although especially low when combined in farming (vegetable growing), will be relatively low in ranching (meat production).

Farmers and ranchers will both be competing for the use of land, and it is necessary that we understand how land is theoretically apportioned between the two uses of vegetable growing and meat production. The individual agriculturalist has no direct control over the rent of land: he simply accepts the going land price as one of the facts of economic life and adjusts the quantity of land he uses accordingly. If the rent of land falls, a rancher will seek the use of extra acres until the last piece is worth no more to him than its price. This marginal worth refers to the extra total (gross) revenue attributable to working an additional acre. When the output is sold under conditions of pure competition, the marginal worth can be calculated by multiplying the marginal physical product by the price at which each unit of output is sold.

All these facts can be stated very succinctly if we are willing to use symbols. Let marginal worth be expressed as  $\theta$ . Let the extra output of meat occasioned by an extra unit of land—that is, the marginal physical productivity of land in meat—be written as  $^m\phi_{d}$ , Let  $P_m$  be the price of meat and  $P_v$  the price of vegetables. Let  $P_d$  be the rent of an acre of land. Then, in the case of a rancher, the marginal worth of land,  $^m\Theta_d$ , is equal to its marginal physical productivity,  $^m\phi_d$ , times the price of meat,  $P_m$ . The rancher's interest in maximizing profit will lead him to rent land until  $^m\Theta_d$  equals  $P_d$ . Farmers who grow vegetables will behave in the same way. This gives us the following set of equations:

$$^{m}\Theta_{d} = {}^{m}\phi_{d} \times P_{m} = P_{d} = P_{v} \times {}^{v}\phi_{d} = {}^{v}\Theta_{d}.$$

If the price of meat goes up, this increases the marginal worth of land to ranchers and they will seek to acquire more. In doing so they will bid up the rent of land slightly. This will

<sup>&</sup>lt;sup>1</sup>The subscripts of the symbols refer to the factors (d being used for land, as both land and labor have the same initial). The superscripts refer to the goods being produced.

force vegetable farmers to relinquish some land so that  ${}^{v}\phi_{d}$  will rise until  ${}^{v}\Theta_{d}$  is raised into conformity once again with the new  $P_{d}$ . On the other hand, a drop in the price of vegetables would also transfer the use of land from farmers to ranchers.

Wage rates will be low. An extra man is of relatively little worth to a farmer or a rancher because an additional laborer can be given only a small amount of land to work. In other words  ${}^{*}\phi_{r}$  and  ${}^{m}\phi_{r}$  are both low because of the large proportion of labor combined with land. Also, the major demand for labor is derived from the demand for vegetables rather than for meat, and vegetable prices in Belgium are very low. These elements conspire to reduce  ${}^{*}\Theta_{r}$  and  ${}^{m}\Theta_{r}$ , and hence  $P_{r}$ .

The Belgian economy in this simple illustration consists of four interrelated markets. These markets are related because one of the schedules in each market is based, in part, on some schedule in a different market. A general equilibrium such as this, resting on mutual interdependence, is characteristic of any closed economy.

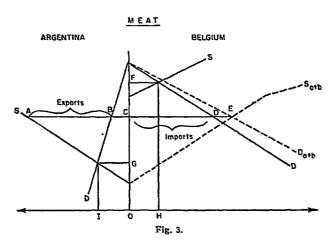
## Free trade and no transportation costs

For analytical purposes it is necessary that we study some of the repercussions that would occur if the national economies of Argentina and Belgium became connected by virtue of commodity trade between them. We shall assume that there is no cost for transporting goods and that there are no import or export obstructions. As a simplification we shall currently ignore monetary problems, suppose that each nation uses the same currency, and assume that central-bank policy is identical in both.

Exports and Imports. Argentina and Belgium comprise a single market if there are no transportation or legal costs in moving commodities. The result will be a uniform price for meat and vegetables in both regions. This price equality is brought about by imports and exports, and these in turn are caused by the price discrepancies which would otherwise exist.

Figure 3 depicts what happens to meat after the advent of

free trade. Argentine and Belgian markets have been arranged back to back. The horizontal scale reads from right to left for Argentina (the left-hand side of the diagram) and from left to right for Belgium (the right-hand side of the diagram).



The demand curve for Belgium is flatter because of the greater consuming population. The supply schedule commences at a much lower price in Argentina, primarily because of the low land rent.

However, these two nations now comprise a single meat market, and one can obtain a combined meat-demand schedule by horizontally summing the two national meat-demand curves. (At each different price there will be a certain quantity demanded in Argentina and another quantity in Belgium. These two quantities added together give the combined demand at that price. This can be done for a number of prices until an entire combined demand schedule is obtained.)  $D_{\sigma+\delta}$  is such a combined demand curve. It is constructed in such a way from  $D_{\sigma}$  and  $D_{\delta}$  that CE = BC + CD. It is pos-

sible to establish a combined supply schedule in the same way, and this has been done in the case of  $S_{a+b}$ . (These combined schedules can be drawn on either side of the diagram; arbitrarily they have been placed on the right, or Belgian, side.)

The equilibrium meat price must be that which equates demand and supply in the market sense. The diagram shows that the combined demand schedule intersects the combined supply schedule at E, and this gives a price of OC. At this equilibrium price Argentina produces AC quantity of meat, but consumes only BC and hence exports the difference, which is AB. Belgium consumes CD and produces nothing at this price, so Belgium must import its entire consumption. The exports from Argentina must equal the imports into Belgium.

What are the human-interest aspects of all these happenings? The people of Belgium are delighted to find that the price of meat has fallen from OF to OC, and so they increase their consumption from OH to CD. The residents of Argentina find that the Belgian demand has raised their meat prices from OG to OC, and they economize on meat by eating only BC instead of OI.

Meanwhile analogous developments are occurring in the vegetable market, for there is now a flow of vegetables from Belgium to Argentina which equalizes vegetable prices in both regions. This new equilibrium price represents an increase for the residents of Belgium and a decrease for those of Argentina. Consequently, more vegetables are eaten in Argentina and fewer in Belgium. Both populations now enjoy a better-balanced diet than before. This is one of the most important benefits derived from international trade.

Recombination of Factors. In the extremely simple case assumed here, all the meat production will take place in Argentina and all the vegetable growing will be done in Belgium.

<sup>&</sup>lt;sup>2</sup>This is an algebraic truism. Combined demand equals combined supply. Symbolically this can be expressed in the form of an equation as  $D_* + D_b = S_a + S_b$ . If one subtracts the Belgian supply and the Argentine demand from each side, one is left with  $D_b - S_b = S_a - D_a$ . The left-hand side of this equation describes Belgian imports and the right-hand side, Argentine exports.

This specialization will decrease the ratio of land to labor employed by ranchers in Argentina because the ranchers now have the use of the land and labor formerly used in vegetable farming, and vegetable farming was always characterized by a relatively low ratio. On the other hand, there will be an increase in the ratio of land to labor employed by vegetable

TABLE 18

COMBINATION OF FACTORS—RATIO OF LAND TO LABOR

ARGENTINA		BELGIUM			
NO.	R \TIO	10 NO.			
	Befe	orc			
120 ranches	6,000 acres to 2 workers 110 ranches on each		300 acres to 4 norkers on each		
80 farms	40 acres to 3 workers on each	190 farms	5 acres to 7 workers on each		
	Aft	cr			
200 ranches	average of 3,616 acres to 2.5 workers	300 farms	average of 113 acres to 5.9 workers		

farmers in Belgium, for a relatively large amount of land and small amount of labor has now been released from ranching. The arithmetic which underlies these statements is exemplified in Table 18.

Changed Factor Prices and Quantities. The sudden introduction of a large trade flow between two regions or nations is likely to change factor prices very considerably. In the present case land rents will certainly rise in Argentina, and they may fall in Belgium; whereas labor wages may fall in Argentina and will certainly rise in Belgium. The common sense of this is apparent. Land in Argentina, which seemed relatively abundant when that region constituted a separate nation, takes on a scarcity value when the two areas are merged into a single unit. On the other hand, the land in Belgium must now compete with the less highly prized land of Argentina. Conversely, Argentine labor must face the competition

of workers in Belgium, who are benefited by the comparative labor scarcity in Argentina.

This process needs to be traced through more precisely. The collective-demand schedule for land in Argentina is now the aggregate of the individual-demand schedules of ranchers only. (The geographic specialization is so complete under our assumption of no freight costs that all the ranchers are now in Argentina and all the farmers are in Belgium.) A rancher's individual-demand schedule for land is based on the marginal worth to him of each successive unit employed. This fact has been symbolized as  ${}^{m}\Theta_{d}$ , and is equal to  ${}^{m}\phi_{d} \times P_{m}$ . Now the rent of land  $(P_d)$  must go up if  ${}^m\Theta_d$  has increased for all ranchers. This is undoubtedly higher now because both "od and  $P_m$  are higher than before. The fact that less land is now combined with each worker in ranching enhances  ${}^{m}\phi_{d}$ , and the consumers of Belgium have increased the price of meat in Argentina. Consequently, the demand schedule for land in Argentina is shifted upwards and to the right. This results in an intersection with the land-supply schedule at a higher rent.

The labor wage in Argentina may fall or rise. Two opposing forces are at work. The collective-demand schedule for labor in this nation is based now on the marginal worth of labor in meat production. Of course  ${}^m\Theta_r$  equals  ${}^m\phi_r \times P_m$ . Because of the increased labor to land ratio now found on Argentine ranches, it follows that  ${}^m\phi_r$  must be lower than before; however  $P_m$  is higher because of the strong demand for Argentine meat by the Belgian market. The over-all demand for labor in Argentina, and hence its wage, will only rise if the percentage reduction in marginal physical productivity is less than the percentage increase in meat prices.

The situation in Belgium can be passed over quickly. Labor wages must be augmented because both  ${}^{v}\phi_{r}$  and  $P_{v}$  will rise. Land rents will rise if the reduction in  ${}^{v}\phi_{d}$  is proportionately less than the increase in  $P_{v}$ .

Parenthetically, it is worth noting that these changed prices

for factors may appear to accentuate the inequalities previously existing between the two nations' supplies of factors. Belgium was always "long" on labor supply. Now that wages have increased, employees may work longer, and a larger fraction of the population may seek jobs. If land rents fall in Belgium, the public may transfer some areas from production to parks, thus further reducing the already small land supply. Reverse developments may occur in Argentina.

The general effect of free trade is to narrow price differences between the nations for any one factor. This reduction is effected principally by a price increase in the nation where the particular factor was abnormally cheap before. This may be supplemented by a price reduction in the nation where the same factor was formerly at a premium. For example, land rents certainly rise in Argentina, but do not necessarily fall in Belgium. However, the rent or wage discrepancy which previously existed is not completely eliminated. Land rents in Argentina will still be below those in Belgium. If complete equality in factor prices existed, one of the chief grounds for international trade would no longer hold.

The effect of free trade on factor prices is naturally of tremendous political importance. Landowners in Belgium fear that freer trade will reduce rents, and hence their incomes. But workers in Belgium should welcome freer trade with Argentina, as this gives them a novel scarcity value. Accordingly, there will be a conflict between different groups within Belgium over trade policy. However, there should be no such conflict between the people of Belgium as a whole and those of Argentina. Policy clashes should, rationally speaking, be intranational rather than international.

# Some special assumptions relaxed

National specialization that is based on differences in factor supply operates in the real world, and not merely in extremely simplified cases such as have been analyzed immediately above. Thus far we have been assuming only two commodities and two factors and two nations. In addition we have assumed either completely unobstructed trade in commodities or else no such trade at all. Moreover, we have not considered the possibility that factors might be transferred internationally. Actually it makes little difference whether we assume two or more nations or commodities; but in all other cases, a relaxation of our simplifying assumption will modify our conclusions.

Transportation Costs. Normally it costs money to transport goods from one nation to another. Not only are there freight charges but there may also be spoilage losses. In this case the price of vegetables will be higher in Argentina than in Belgium by the total transfer cost of vegetables per unit; for example, if the transfer cost of vegetables is 28¢ per pound, the price in Belgium will be this amount below the Argentine quotation. Both nations will share the burden of transportation charges, but not equally except by accident, with the producer in the exporting nation accepting a lower price, and the consumer in the importing area having to pay more.

If the price differential occasioned by transfer costs reaches a certain magnitude, geographic specialization will be partial rather than complete. Imports will be supplemented by home production. Argentina will start growing some vegetables or Belgium will engage in limited meat production. Let us examine the reason for this last development. Until now, the prices of labor and land in Belgium have been based on their marginal worth in vegetable production—that is, P, was equal to  ${}^{o}\Theta_{r}$  and  $P_{d}$  was equal to  ${}^{o}\Theta_{d}$ . Consequently, agriculturalists in Belgium under these circumstances could not afford to hire labor or land for use in meat producing, as <sup>m</sup>θ, was less than  ${}^{v}\Theta_{r}$ , and  ${}^{m}\Theta_{d}$  was less than  ${}^{v}\Theta_{d}$ . Now, however, as  $P_{v}$  falls and  $P_m$  increases owing to the incidence of transportation charges. it happens finally that  ${}^m\phi_r \times P_m$  equals  ${}^o\phi_r \times P_v$  and  ${}^m\phi_d \times P_m$ equals  ${}^{v}\phi_{d} \times P_{v}$  Meat production begins in Belgium when this occurs.

Recognition of transportation costs only modifies our former conclusions in minor respects. There will not be perfect price

equality between nations by commodities. Geographic specialization will not be complete because home production will supplement imports.

International Transfer of a Factor. In real life many factors are moderately mobile, and accordingly the possibility of factor transfers must be taken into account. Factor prices tend to be unequal among nations, as we have seen. This inequality evidences differences in relative factor supply, and is one of the bases of commodity trade. However, where factors are fairly mobile, this same price inequality may evoke a transfer of factors instead.

Within limits, the labor force is mobile. Migrations of workers do occur, and these population movements are not infrequently motivated by a desire either to escape depressed wage areas or to obtain higher earnings. This is especially true over long periods of time, but in the short run there is considerable inertia, as one might suppose.

What would have happened in our hypothetical case of Argentina and Belgium if labor had been highly mobile? There would have been an exodus of workers from Belgium and an influx into Argentina. The major reason for this movement would be the difference in wage rates, but a minor influence might be that some of the workers from Belgium are especially partial to the consumption goods that are so abnormally cheap in Argentina. Such a migration will presumably stop short of realizing complete wage-rate equality because there are many financial deterrents, to say nothing of the psychological, incident to traveling from region to region, altering one's domicile, and changing one's job.

If we suppose perfect mobility of labor, however, we should theoretically expect a cessation of commodity trade in the special case of our simplified illustration. Factor price equality would mean that labor and land were being combined in similar proportions in both regions. The per unit cost of production, whether of meat or vegetables, would then be the same in each region if we can ignore climatic factors. There

would no longer be price incentive for commodity trade. However, this rather extreme conclusion, that factor mobility precludes trade in goods, stems from our assumption of only two perfectly mobile factors. In reality there are dozens of different agents of production, and at least one of them will be fairly immobile. As long as there is one stationary factor in unequal supply, there will be a tendency to combine factors in different proportions in the various nations, and this will result in the production-cost differentials that are the immediate basis of international trade. Equality of wage rates might put an end to interregional trade based on relative differences in labor supply, but there would still be differences in the supply of other factors, which should give rise to international trade. It is true, however, that factor transfers are a partial substitute for commodity trade.

Numerous Goods and Services. The two primary factors of. production are labor and land—that is, natural resources. Obviously these are not homogeneous entities. There are many different noncompeting groups within the supply of labor, whereas the land classification could be subdivided almost indefinitely. For example, there is arable land, grazing land, forest land, iron-ore deposit land, hydropower site land, and salmon river "land." Certain of these, such as arable land, can be distinguished according to fertility. Moreover, the combining of land and labor results in the making of a multitude of produced means of production. These intermediate goods (sometimes called capital goods) are also productive agents: examples are lathes, cotton yarn, and tractors. National economies must relate a great many factors and products. Recognition of this obvious fact does not vitiate our theory, but merely renders it more complex. Some of these problems are dealt with in the following section.

### The Principle of Minimizing Transportation Cost

Geographic specialization, especially in the case of processing and manufacturing trades, is the result of the similar decisions of different producers regarding the location of their plants. Usually, other things equal, plants tend to be located so as to minimize total transportation costs. This is particularly true of goods which are heavy or bulky relative to their value, so that transportation is an especially important cost element.

An outstanding example of how the principle of minimizing transportation costs dictates location is afforded by the steel industry in the United States. Steel makers have need of a great many productive agents. Two of the more important are coal and iron ore. Unfortunately, these raw materials are not found together in the same locality, and to make the problem more difficult, the main consuming market for steel is usually located somewhere else. Should steel makers locate over the iron ore and ship in the coal? Or should they follow the opposite policy and transport the iron ore to the coal deposits? Or should they locate near the steel market and transport both coal and iron ore? The situation is somewhat like a multiple tug of war with the steel plant in the middle, and the factor sites and the final market all exerting pulls in different directions.

The steel industry has tended to orientate itself to its fuel supply. This is because coal is a weight-losing rather than a weight-saving factor, whereas iron ore is the reverse. The entire tonnage of coal necessary for iron and steel production is used up on the spot. In the case of iron ore, however, especially when the rich Mesabi range was first being exploited, almost two thirds of the iron-ore tonnage was retained to become steel later. Thus, the most economical solution was to locate the steel plants near the coal, and so avoid all or nearly all transportation cost on account of fuel. On the other hand, location near the iron-ore deposits would save only one third of the freight bill for ore. The steel industry in the United States therefore located initially around Pittsburgh, near good coal deposits, and shipped in the iron ore from western Michigan. And in the early days most of the market for iron and steel was in or around Pennsylvania. In recent decades, however, the industry's location has become more scattered. The railroad cars that carried iron ore from the shores of the Great Lakes to Pittsburgh could be used to bring back coal on the return trip. Consequently, some coal came to meet the iron ore at points such as Erie, Cleveland, and Gary. Another factor that accelerated this shift was that the Michigan ores became more weight-losing as the best deposits were depleted. The new plants on the lake shore were closer geographically and freightwise to the developing market afforded by the automobile industry around Detroit. A minor element was the sale of manufactured gas to public utilities serving neighboring cities.

The steel industry has naturally located itself with regard to those necessary factors that are found only in a few places. Conversely, location has not been determined by ubiquitous factors. Hence, labor supply has played a relatively small part in determining the industry's location.

Two important rules can be deduced from the above illustration: the dominant factors in determining location are those that are uniquely distributed and weight-losing, whereas the subordinate factors are ubiquitously distributed and weight-saving. The location of much of the world's industry and the geographic specialization to which it gives rise can be explained in terms of these two connected rules.

In a preceding section it was pointed out that international trade in factors can be a partial substitute for commodity trade. Which kind of trade actually occurs is largely determined by transportation cost, which in turn often leads to a consideration of how weight-losing different goods are at various stages of production. An example may clarify this. Many of the doors in British homes are made out of wood taken from western Canadian trees. This wood might be transported from Canada to Britain in the form of logs fresh from the forests, sawn lumber, or in the form of manufactured doors. In practice logs are never shipped, not only because they are hard to stow away on board ship but because so much of their weight

goes to waste when sawn at the mill. Finished doors are the most weight-saving and are often shipped even though they bear a higher freight rate per 100 pounds. There is also some trade in sawn lumber. The rule is that intermediate goods tend to be processed where they originate if they are very weight-losing in production. Generally, goods are most weight-losing at the earliest stages of manufacture. They become more weight-saving each time they are reprocessed.

However, processing may be done close to the final consuming market and far away from the source of the raw material when the latter is highly weight-saving. A large proportion of the petroleum products sold throughout the northeast United States is refined on the New Jersey shoreline out of crude petroleum imported from the Gulf ports and Venezuela. Almost nothing is lost from a barrel of crude petroleum; what cannot be made into gasoline, Diesel oil, or bunker fuel will emerge as kerosene, asphalt, or petroleum coke, or will be worked up into lubricating oil and petroleum jelly. Also, when specialized carrying facilities have to be devised, it is cheaper to transport crude petroleum alone than its multifarious products.

Another element which must be considered is that the freight rates charged by public carriers tend to be based on the value of the goods transported. Finished goods are more valuable per unit weight, partly because more labor has been invested in them, and they usually move at higher freight rates per 100 pounds. In addition, finished goods (such as furniture or chinaware) may be more liable to spoilage or breakage than their prime constituents (for example, lumber and kaolin), and this greater risk is reflected in higher transportation costs. The fact of higher freight rates on relatively finished goods often means that by-products are commercially valuable only if obtained near the markets where they will be sold; conversely, processing far away from final markets may prevent the realization of any revenue from by-products, and may have the effect of substituting losses for profits. There-

fore, partially processed goods that are completely or highly weight-saving, and especially those that yield by-products, tend to be worked up near the final market. However, most completely unworked goods save an insufficient percentage of their weight to justify transportation before being subjected to at least some rudimentary processing. Most of the goods seen moving in international trade have already been worked up enough to make them exceedingly weight-saving, and are now being transported toward their final market before additional processing and enhanced valuation subject them to heavier freight rates.

Industrial plants are generally located with reference to transportation costs. Numerous productive agents have to be assembled from different places, and the principal and secondary products have to be shipped to one or more markets. Some single location will presumably reduce to a minimum the total freight bill. The majority of competitors in the same trade will be faced with the same problem and, after taking into account product prices and freight rates, will often reach the same decision concerning the best location. The result is geographic specialization.

#### Miscellaneous Bases of Geographic Specialization

There are a number of additional determinants of industrial location that deserve consideration.

#### Mass-production economies

In many lines of manufacture volume production makes it possible to use equipment and techniques that permit lower unit costs. However, these same methods and machines usually cause a large overhead expense and hence can occasion abnormally high unit costs unless there is volume production. (The automobile industry well exemplifies this phenomenon.) Volume production per plant or firm normally requires a large market. For this reason industries that are subject to mass-production economies are normally found in those countries

that comprise large enough markets to ensure a high volume of output. Nations that comprise only a small market cannot normally sustain an industry in which plants experience markedly increasing returns. Accordingly, automobile and aircraft factories are located in nations having a large domestic market. The opposite possibility, location in a smaller nation while supplying other larger nations, is hardly practical because a very much larger percentage of the sales would be subject to international transportation costs or customs duties. Geographic specialization is in considerable measure based on the size of the market when mass-production economies are an important element.

#### Strength of the market

Some goods and even more, services, are of an extremely rare type which the ordinary person either does not want or cannot afford. Accordingly, one finds these things supplied only where there are enough out-of-the-ordinary people to support such businesses. Expensive gadgets, of little functional use but having some novelty appeal, are throughout the world a characteristic of regions or nations having high rather than low incomes. Commercial orchid-raising within the temperate zone is an example. The best designers of sailing yachts are found in the northeastern United States and in Britain. Specialty services and products are usually found only where the national market is strong either in the sense that there is a dense population (so that there are enough fastidious people to constitute an adequate clientele) or there are a number of extraordinarily rich people (who can gratify whims which in a person of average means must remain latent).

### Economic symbiosis

(In economic life there are various enterprises that depend in part on others for their own continued existence. Sometimes the interdependence is mutual and beneficial to both) Such relationships are rather analogous to symbiotic parasitism in biology. A few citations of leading types may breathe life into this concept.

Externally Conditioned Labor. (Different industries often give supplementary support to the same group of workers or their families. For example, the logging industry of Canada operates only in the summer and pays wages during this period alone. In the wintertime many loggers are employed by railroads in maintaining their right of way.) This arrangement benefits both the logging companies and the railroads. Each would be compelled, if the alternative employment did not exist, of paying a wage that could support the worker throughout the year. The economies which such seasonal complementarity provides are sometimes an important determinant of geographic specialization.

Heavy industries, such as coal mining and steel making, employ prime males rather than women and girls. However, the employed men are often heads of families which include the normal proportion of adolescent and adult females. Most of these women, and almost all the unmarried ones, will seek employment unless the head of the family is earning abnormally good wages. Usually the take-home pay of the principal breadwinner is insufficient, and then the household's income must be supplemented by other members of the family. In the past it has often happened that a region of heavy industry such as mining has attracted a light industry such as textiles to the same locality because of the abundant female labor obtainable at low wages. In some senses this development might be termed by-product labor.

With the passage of time, the light industry may become almost as important as the heavy industry that was initially dominant in the region. Then one might expect a tendency for women's wages to increase somewhat, and the earlier insistence that the heavy industry pay wages that could support an entire household, to lessen. The final result may be that both the light and heavy industries will enjoy somewhat lower labor costs because they are together supplementing the in-

come of workers' families. Consequently, one often finds industries that primarily employ women located in the same towns and regions as permanently located industries that employ mostly men.

There are some rather similar developments at the other end of the income scale. Many of the leading figures in the entertainment world reside around Los Angeles, California, because the motion-picture industry is located there; the major radio networks are, therefore, compelled to originate many of their top coast-to-coast programs from Hollywood rather than from New York, as was previously the case. Radio and screen are increasingly sharing the same players and writers, and this tendency influences regional specialization.

By-products. The making of many goods yields by-products which can be obtained cheaply by subsidiary industries that are able to use them. Meat packing gives rise to a host of related industries that are dependent upon its by-products. Examples are gluemaking from hooves, fertilizer manufacture from bone, and leather making from hides. In such cases regional or national specialization in the main product leads to regional or national specialization in the side products.

#### Summary

Nations will normally specialize in those goods that producers can sell cheaply. Ability to quote low prices is largely based on low unit costs of production. In all regions or nations there are local circumstances that cause markedly low production costs in at least a few lines of enterprise.

A region or nation will have low unit costs in producing a specific good if (1) the output-to-input ratio is very high, (2) the inputs are low priced, or (3) the total transportation bill from all input sources to the enterprise, and then on to the consumers, is low. The importance of climate, especially in the case of agriculture, lies in the fact that it largely determines the ratio of output to input. Given a certain output-over-

input relationship, it is obvious that costs per unit of output will depend upon the price of inputs. Factors of production are priced according to the relative strength of demand and supply. In general the per-capita demand for specific factors does not vary considerably from region to region or nation to nation because people everywhere have somewhat similar wants and needs. The variation in factor prices, which is often so apparent among regions or nations, must, therefore, be in large measure due to differences in their supply. Finally, joint-demand factors may be located in different regions or nations, and in this case a compromise location in some one region or nation will be selected in order to minimize all transportation costs per unit of output.

A very broad statement would be that geographic specialization is based on favorable climate, abundant supplies of a necessary factor, and upon the possibility of keeping transportation costs at a minimum.

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### Chapter 6

## Making International Payments

un earlier study of a nation's debits and credits has shown that residents of different countries must frequently make payments to one another on account of imports, interest on money borrowed abroad, and for many other reasons. International settlements are more complicated than in the case of domestic transactions because the payer and payee are residents of different countries, each having distinct currencies. During the passage of time a number of specialized techniques for making international payment have been developed. A number of these techniques will be examined in the following pages.

### The Meaning of Foreign Exchange

Foreign exchange is a collective term that includes all kinds of negotiable claims expressed in a foreign money. The foreign trader or financier is interested in particular kinds of foreign exchange, such as sterling, franc, or belga exchange. An American investor who is purchasing British securities in London will have to pay for them in sterling claims, and hence will purchase sterling exchange in order to discharge his liability. Specifically, he will attempt either to buy sterling bank balances with dollars, trade acceptances drawn in sterling, or perhaps sterling money itself. These various kinds of sterling exchange come into existence in different ways and must usually be purchased from different sources.

### Financial Payments

Leading American banks will normally maintain a demand deposit with a so-called correspondent bank in London, with another in Rome, in Mexico City, and in the financial centers of all important countries. These bank balances, which are owned by the American bank, are the equivalent of sterling, lire, and pesos respectively. Conversely, foreign banks hold balances with correspondent American banks, such as the Chase National of New York. American banks undertake foreign-exchange operations whenever they sell these foreign balances for dollars, or add to them by purchasing foreign claims for deposit in these same foreign accounts.

#### Purchase of a foreign bank draft

(The most direct method of obtaining foreign exchange is to walk into a bank and purchase a foreign bank draft.) If a United States resident wants lire to remit to relatives in Italy for Christmas, he can use dollars to buy a lira draft from his local bank, which is essentially an order to pay. It is drawn by the American bank upon its Rome correspondent and will be made out in favor of the party designated by the purchaser of the draft. In effect the American bank is writing a check on its Rome account and selling this check to a United States resident. The bank draft in this case calls for payment in lire and is sold for dollars, and so a foreign-exchange transaction has taken place. The dollar price of the lira draft will be based on the prevailing exchange rate, after which a service charge will be added by the bank.

The dollar price of bankers' sight drafts on Rome can be considered the prevailing exchange rate for lire. However, the American bank will sell its Rome balances at a slightly higher price if the remitter is in a hurry, or at a lower price, if he will wait for his lire.

The quickest way to obtain lire is to purchase a cable transfer from the American bank, which will then wire its Rome

correspondent to make certain payments. Cables always cost a little more because, apart from an extra charge for telegraphing, the bank balance must actually be in Rome the moment it is sold. This is not so in the case of a sight draft because the latter cannot be presented for several days. In the meantime the American bank need not cover its draft, and can be earning a small interest return in Rome through investing in short-term paper, or call loans. This consideration is less important today than before the advent of trans-Atlantic airmail.

On the other hand, the American bank might sell a time draft, in which case the order to pay will not become effective for 30, 60, or 90 days. Drafts of this kind must obviously sell at a discount because the bank is receiving dollars now from the purchaser, but will not have its Rome balances debited for at least one to three months. This discount is based on current interest rates in the money market.

### Sale of foreign claims to a domestic bank

People often receive payment in foreign funds. An American investor who has bought securities of the London, Midland, and Scottish Railway will be paid any forthcoming interest or dividends in pounds sterling. These will probably be received in the form of a check drawn by the British railway company on its London bank. The United States investor will probably sell this sterling check to the foreign exchange department of his local bank and obtain the appropriate number of dollars less a service charge. The local bank will collect through its correspondent bank in London. The American bank has reduced its dollar holdings and has augmented its sterling balances in Britain.

### Paying for Merchandise

Several special methods have been developed for making merchandise payments. One reason for this is that the shipper usually refuses to release control of the goods he is selling until the importer accepts financial liability. In most cases the initiative is taken by the exporter, who is naturally the most interested in ensuring collection, and the agreed-upon price is expressed in the seller's money. In certain cases, however, the selling price may be contracted in the importer's currency, and occasionally the importer may take the first steps to effect a settlement. In each instance the technique of making payment must be varied to suit the circumstances.

#### The documented bill of exchange

One of the oldest procedures of obtaining payment for exports is for the shipper to draw a bill of exchange upon the foreign buyer. A bill of exchange is an order to pay. The

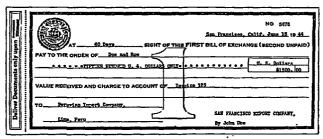


Fig. 4.

drawer (exporter) instructs the drawee (importer) to transfer the face value of the bill according to the instructions of a designated payee (possibly some bank to which the drawer sells the bill). A bill is hardly negotiable until the drawee has admitted the liability asserted in the bill. This admission of liability occurs when the bill is presented to the drawee and he accepts it by writing accepted across the width of the bill, whereupon the bill becomes two-name paper and can be readily sold.

There are various kinds of documentary bills, or drafts. American exporters normally bill their customers in dollars, and so the bills they draw are called dollar drafts. Occasion-

ally, in the case of shipments to leading countries such as the United Kingdom, the American exporter of tobacco or cotton may draw the bill in sterling, in which case it is a sterling draft, and will probably find its way on to the London bill market via an American bank. Documentary bills differ as to the time of payment. Sight bills must be paid within a day of presentation. Time drafts call for payment in 30, 60, or 90 days, as indicated on the face of the bill. (Fig. 4 depicts a typical time draft.)

The importer cannot obtain physical possession of the goods that have been shipped to him until certain documents, such as the bill of lading and marine insurance receipts that were originally attached to the bill, are released to him. A documentary acceptance draft (or D/A draft) calls for release of these documents to the importer upon his acceptance of the bill. But a documentary payments draft (or D/P draft) provides for effectual release of the goods only upon actual payment by the drawee. Practice naturally varies according to the countries and commodities concerned. The D/A draft is generally used for exports to Latin America. However, exporters try to use the D/P draft in the case of shipments to southeastern Asia' and other less trustworthy regions.

It should be emphasized that the exporter, who draws the bill in the first place, does not hold it through the entire procedure of acceptance and eventual payment. He will probably sell it to his bank or through a bill broker to some person wishing to invest funds at short term. The drawer does not normally obtain the full face value of the bill. A time draft is naturally discounted as an interest charge.

Sometimes there is a charge for currency exchange also. If an American exporter to Britain draws a sterling draft and he sells this bill to his local bank, he is disposing of pounds sterling for dollars. The bank will make a small charge for this additional service of selling dollar balances in exchange for increased deposits in London.

The documentary bill of exchange is falling into relative

disuse. The shipper does not have a negotiable instrument until the drawee has accepted the bill, and there is an inevitable delay before presentation can be made. A more important consideration is that even a sight draft that has been accepted by a fairly obscure importer may have to be disposed of by the drawer at a special discount because of the credit risk. These defects have led to an increasing use, as described immediately below, of bankers' bills authorized by a letter of credit.

#### The import letter of credit

(A common procedure nowadays for making payment on a foreign trade transaction is to have the importer take the initiative by arranging for his bank to send an import letter of credit to the shipper. This letter of credit obligates the importer's bank to accept or honor drafts (bills of exchange) which are presented to it, provided these bills of exchange are accompanied by prescribed documents. The foreign exporter, who receives this undertaking by the importer's bank, can now rely upon the credit of the bank and of the importer. The exporter will then draw a bill on the importer's bank and should have no difficulty in selling this draft.)

For example, a New Jersey importer might go to the Chase National Bank of New York and request this bank to open a letter of credit in favor of Señor Ortiz, a Chilean exporter of hemp. By this act the Chase Bank undertakes to honor Ortiz's drafts if the drafts are drawn under the credit and are presented before a given date accompanied by ocean bills of lading to the order of the New Jersey importer and by Ortiz's invoice for x tons of hemp. The Chase Bank has pledged its credit; therefore it must consider the risk and the security. The risk is the reliability of the New Jersey importer, and the security is the merchandise involved. The New Jersey importer is expected to pay eventually for the goods: the Chase Bank merely stands behind the transaction in the role of guarantor and intermediary.

The mechanics of payment involve several steps. (1) Upon shipment, the Chilean exporter draws a bill on the Chase Bank rather than on the importer. (2) He sells this draft to his local bank for pesos at a discount. (3) The Chilean bank forwards the draft, documents, and instructions to its correspondent bank in New York. (4) The correspondent presents the draft with documents to the Chase Bank for acceptance. (5) The Chase Bank transmits the shipping documents to the importer in order that he may obtain the merchandise from the transportation company. (6) The correspondent bank undertakes collection from the Chase Bank on behalf of the Chilean bank when the draft matures. (7) The Chase Bank, in accordance with the agreement under which it originally opened the letter of credit, recoups itself from the importer.

As a result of this series of operations, the importer obtains credit and finally pays in dollars; the Chase Bank earns a commission for having opened the letter of credit; the correspondent bank makes a charge for acting as a collection agent; the Chilean bank earns the discount on the funds which it advanced; and the exporter receives immediate payment in pesos. It is also noteworthy that the Chilean bank now holds more dollar assets, which are deposited with its New York correspondent, but has reduced peso balances. A foreign exchange transaction has taken place. Figure 5 depicts a typical letter of credit of the irrevocable type.

#### The export letter of credit

(A reverse variation of the above procedure is afforded by the export letter of credit. In this case the exporter is paid locally by an agent of the importer's bank upon presenting evidence that shipment has been made. Bills drawn by the exporter under this method are domestic sight drafts.)

We shall suppose that Señor Perez of Chile wishes to buy some locks from the Safety Lock Company of New Jersey. A contract is signed as a result of correspondence between Perez and the Company. This contract contains a provision that

ATRUATI.

August 14, 1943

Banco Hispano Americano, Barcelona, Spain

Subject: Our Irrevocable Letter of Credit No. 12345

Centlemen

We confirm our emblegrem of today, wherein we requested you to advise the SEARISE EUFOUT CALTAIT, Ress, Spain that we have established our Irrevocable Credit No. 12345 in their faure, for secoust of the SAI FRACCISCO INFORTING CAPRAIT, San Francisco, for the sum of TEM TENNIOD STRING INCOME THE TOTAL TO THE SAID AND THE SAID THE SAID

Commercial Invoice evidencing 2-1/25 discount, covering TEX TENUSARD (10,000) hites prime TARROWN, NELLED FILERES, Crop 1942 in bags marked "Produce of Spain" at \$10,00, less 2-1/25 discount, per kilos, C. 27, U.S.A. Atlantic of Oulf Pyrt.

Other documents requireds

Computer Invoice Full set of Ledge, to order of chipper, blank endorsed, marked freight propaid, about Mrted Motify SMI FRUCISCO INCORPORTIO COURSE, San Francisco", ordenging single Adjament, by direct Portuguese or Spanish stemer, during the jonath of August, 1953.

Shipment from Lisbon, Fortugal to the U.S.A. Atlantic or Gulf Forts.
Insurance to be effected by the buyers. Fart shipments are not allowed.

This credit is covered by V. S. Troasury License SF-67890.

Drafts drawn under this credit must be marked: "Drawn under Bank of America E.T.& S.A., San Francisco, Irrovocable Credit No. 12345 dated August 14, 1943".

We hereby engage with drawers, endorsers and bons fide holders of drafts drawn under and is coupliance with the terms of this credit, that same shall be duly hanced on presentation, if accompanied by documents as specified. This credit expires September 10, 1943-

Yours very truly,

W. L. Guthrie, Assistant Manager. payment will be provided by an export letter of credit. Contract in hand, Perez will go to his local bank in Chile and explain to it the nature of the deal, the amount to be paid, the merchandise to be shipped, the documents required, and the expiration date. All this is required so that the letter of credit can be established to conform to the terms of the contract between Perez and the Safety Lock Company. When this has been accomplished, Perez' bank in Chile will write or cable its correspondent bank in the United States, instructing it to advise the Safety Lock Company of the establishment of the letter of credit and its terms.

The export credit, in this case, is a contract between Perez and his local bank, and is distinct from the purchase agreement between Perez and the Safety Lock Company. The letter of credit binds Perez' bank to accept bills that are presented to its correspondent bank in the exporter's country. However, this commitment is qualified as to duration, type of merchandise, and total value. It is generally stipulated that the draft be accompanied by shipping receipts and other documents to prove that shipment has been made and in order that Perez' bank might acquire physical control of the goods. Naturally this obligation of Perez' bank is far more valuable to the exporter if it is legally reaffirmed by the correspondent bank in the United States. Or the American correspondent could issue its own irrevocable export letter of credit.

Under the arrangement here being described, the Safety Lock Company draws documented domestic sight drafts upon the Chase Bank and receives dollars. The Chase Bank debits the account of the Bank of Chile and forwards to the latter the relevant shipping documents. The Chilean bank will hand Perez these documents, which give title to the merchandise, when he comes in to make a settlement. As a rule a Latin American importer will pay his bank about 25 per cent of the peso cost of the dollars, and will sign notes carrying six or seven per cent interest for the balance. These notes are usually not paid off until the imported goods have been sold. The im-

porter's bank reduces its dollar assets in America immediately and eventually improves its peso position in Chile.

### Domestic purchase of a foreign-trade bill or bank draft

An exporter will sometimes sell on open account, in which case he will mail the shipping documents to the importer prior to any payment or definite obligation. It is unusual to release goods in this way because the exporter runs the risk of default and his working capital requirements are increased. Presumably the importer will effect payment and is to be trusted, in which case the importer may purchase a bank draft from his local bank, drawn on a correspondent bank in the exporter's country. Or the importer may buy a duly authorized and/or accepted foreign trade bill drawn in the exporter's currency. Drafts of this kind are almost the equivalent of foreign money for certain purposes.

Suppose that an American importer  $(I_A)$  has to pay a British exporter  $(E_B)$  in sterling, and that concurrently, an American exporter  $(E_A)$  is billing a British importer  $(I_B)$ , who has contracted a purchase in sterling. An economical short-circuiting of the banks now becomes possible.  $I_A$  can use dollars to buy  $E_A$ 's sterling bill and subsequently instruct  $I_B$  to make his sterling payment to  $E_B$ .  $E_A$  may have drawn the bill on  $I_B$ 's bank in Britain, and such a bill will find a readier market. If purchased by  $I_A$ , instructions will then be given  $I_B$ 's bank to pay  $E_B$  the amount of the bill. The two Americans buy and sell in dollars. The two Britons handle only sterling.

This latter method is economical because it avoids the foreign-exchange charges made by banks for converting currencies. However, there is some expense and often considerable inconvenience. Exporters who draw bills are not acquainted with importers who wish to purchase them, but bill brokers make this their business, and usually charge one eighth of one per cent for the service of bringing the parties together. The importer will be unable to buy sterling bills exactly totalling his indebtedness in Britain: he may have to cover a small

balance by purchasing a draft from a bank on its foreign correspondent. However, if the importer has a steady business of buying from Great Britain, he will probably keep an account with a British bank. The proceeds of sterling bills will then be paid into this account, and he will write checks against it in the customary manner when he has payment to make in the United Kingdom.

### Settlement through a third currency

Although most of the foreign trade of the United States is financed in terms of dollars nowadays, this has not always been Before World War I, for instance, most of our trade was financed in sterling through London. In many parts of the world today foreign trade is not always carried on in the money of either the exporter or the importer, which is especially true if their respective currencies are of fluctuating value or if their countries participate in international trade to only a minor extent. For example, a shipment of rabbit skins from a French collector to a Belgian manufacturer of hat felt might be transacted in dollars. The Belgian importer provides dollar exchange by writing a check on a deposit he keeps in New York, arranging for his local bank's New York correspondent to accept drafts drawn upon it by the French exporter, or by purchasing dollar bank drafts or trade acceptances. The French skin collector will have no difficulty in disposing of dollar ex-A surprising proportion of the trade of small nations, especially where the businessmen concerned must resell or repurchase in foreign markets, has always been transacted in a few key currencies, such as sterling in the past or United States dollars today.

#### Extraordinary Gold Transfers

A decade or so ago, when gold was still unrestricted, very large financial transfers were sometimes effected through gold shipments. If a London bank wished to make an extraordinary shift of funds to New York, it might sell sterling to the

Bank of England for gold and ship the gold to New York, after which the London bank would sell the gold to the United States Treasury for dollars. This series of transactions is analyzed more completely in Chapter 28, but it may be stated here that such transactions require unrestricted gold movement and an assured buying-and-selling market for gold in the exporting and importing countries respectively. This has not been the case for more than a decade

#### How Imports Help to Finance Exports

The above description of alternative ways of making international payments underlines once again the offsetting character of a nation's exports and imports. (In the majority of cases our exporters seek payment in dollars under the terms of export letters of credit opened in favor of American sellers by foreign importers, or on the basis of dollar drafts drawn by American sellers on foreign buyers. Foreigners thus have to have a source of dollars if they are to be able to do their financing in dollars. At bottom it is our importers who are the foreigners' source of dollars. We pay foreigners for our imports with checks on American banks, and foreigners in turn use the dollar balances so acquired to pay for our exports. When trade is flourishing on a sound basis, dollar balances shift back and forth between our exporters and foreign exporters to lubricate the wheels of mutually advantageous commerce.)

Our exporters in some cases seek payment by drawing bills of exchange against foreign customers or upon importers' banks, but payment is actually not received until the bills are sold. There are two principal kinds of draft purchasers. One is the United States importer who can meet obligations to French, German, and other exporters by buying franc, mark, and other foreign bills. If it were not for the existence of these American importers, a very large part of the market for foreign bills drawn by United States exporters would vanish. Our exporters in many cases are thus paid by our own importers.

American banks are the other principal buyers of bills drawn by exporters in this country. In this way American banks increase their balances with correspondents abroad and reduce their dollar holdings. Essentially our banks are buying foreign exchange with dollars when they discount a foreign draft or bill made by an American exporter. These foreign balances are part of the stock in trade of American banks and would not be bought if there were not other people to whom they could be sold. Who wants to buy drafts of American banks on foreign correspondents? Some United States importers, for example. because they have to pay for the goods bought abroad. Some United States investors (importers of evidences of indebtedness), for another, because they have to pay for foreign securities purchased abroad with foreign funds. Therefore, here again it appears that our exporters receive payment from American importers of all kinds.

The international transactions which cause increases and decreases in American-owned balances held abroad deserve closer scrutiny. How does a New York bank (N1) change its balance with its correspondent bank (L) in London? Transactions with United States residents will have the consequences listed below:

#### NY's Balance with L

Increased by

Buying sterling bills from exporters

Buying sterling checks from investors in British securities (for interest)

sellers of securities held abroad all others receiving payment from Britain

Decreased by
Sale of sterling bank drafts to
importers
purchasers of securities held
abroad
immigrants making remittances
all others wishing to make
payment in Britain

The above-listed repleting and depleting transactions will not balance over short periods except as a result of conscious policy on the part of the New York bank.

(If the tide of international payments is flooding toward the

United States from Britain, it is likely that L's balance with NY will decrease. Sooner or later L will become worried because the funds held with NY are becoming dangerously low. There is excessive demand in the United Kingdom for dollar drafts on NY, as is evidenced by the condition of the nation's balance of payments. How can L's balance with NY be increased?)

(One possibility is that NY might decide to hold larger balances with L. NY is probably L's New York correspondent if L is NY's London correspondent. However, the condition of the balance of payments which accounts for the decline in L's NY funds is probably increasing NY's sterling balance with L. Therefore, NY will probably be unwilling to hold further balances with L.)

Unless the balance of payments shifts again in the opposite direction of its own accord, the eventual solution is what amounts to a change in the dollar-sterling rate of exchange. NY will have to buy fewer sterling bills in New York and sell more sterling drafts on L by lowering the dollar prices of both. Simultaneously L will attempt to buy more dollar bills in London and sell fewer dollar drafts on NY by raising the sterling prices of both. This cheapening of the pound should encourage residents of the United States to import more goods and securities from Britain and to export fewer. As the adjustment continues, it will become increasingly evident that our exporters of goods and securities receive payment for their sales because of the expenditures by United States importers of goods and securities.

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### Chapter 7

# The Rate of Exchange

RATE of exchange is the price which must be paid in local currency for a unit of foreign money. Thus a rate of 4.04 on London in New York means that the dollar price of a British pound is currently \$4.04 in the United States. Numerous exchange rates are quoted in New York at any given moment because there are always a number of different currencies being bought and sold there, and each currency has a distinct dollar price. If all these prices fall together, the dollar is appreciating, but if only the rate on London fell, it would indicate a depreciation in pounds sterling. One must always examine more than one rate to discover what is happening. Since exchange rates are prices, they are directly determined in the market by the international demand for and supply of currencies, and ultimately by the forces summarized in the balance of payments.

### The Market Determination of Exchange Rates

The immediate determinants of an exchange rate between two currencies are the market offers of one money for the other and the connection of either to gold.

#### Gold standard currencies

A nation's currency can be said to be fully on gold if the issuing authority stands ready to (1) buy and sell gold in unlimited quantities at a fixed currency price and (2) permit unrestricted gold movements into and out of the country. The practical significance of these requirements is that an in-

dividual who holds local currency knows in advance how much gold he can obtain in exchange and how much foreign money this gold will buy when it has been shipped to another country. Under these circumstances the exchange rate of two gold-standard currencies will fluctuate within very narrow limits around what is called the *mint parity*.

Before World War I and again during the late 1920's, the United Kingdom and the United States were simultaneously on a full and unqualified gold standard as defined above. The gold sovereign contained 113.0016 grains and the gold dollar consisted of 23.2200 grains of pure gold. The reciprocal of the gold-content ratios is the mint parity. Hence, the exchange rate of dollars to pounds, based on the mint parity, was as 113.0016 is to 23.2200. This quotient gives a price of \$4.8665 for one pound sterling.

(If both countries were on a gold standard, a person who wished to transfer a large sum from dollars into pounds could do this in two ways. Either he could buy sterling exchange with dollars in the ordinary way or he could ship gold from the United States to Great Britain. (This procedure was described in Chapter 6.) If the second method entailed no special expenses, it would give an effective exchange rate of \$4.8665 to one pound sterling.)

However, there always is some expense attached to gold shipment. The gold has to be crated; there are freight, insurance, and safeguarding charges; a small amount of interest earnings are lost while the gold is in transit; there is a little loss from abrasion; and the central bank of the receiving country may charge a fee for a minting service no longer actually performed. These various costs amounted to about two cents per pound sterling before the war.

In practice the exchange rate between the dollar and the pound used to fluctuate over a range of two cents on either side of the mint par. There were no gold shipments as long as the rate remained within this narrow range. If a debit flow developed in the payments of the United States with Great

Britain so that a strong dollar demand for pounds set in, the rate would rise to \$4.8865, after which gold would be exported from the United States in lieu of a direct purchase of pounds with dollars.

Hence, anyone shipping gold to the United Kingdom—that is, transferring from dollars into pounds—would really pay two cents above the mint parity, or \$4.8865. This critical rate of \$4.8865 was termed the gold export point. Conversely, in the event of a flood of funds towards the United States from Great Britain, the relative oversupply of pounds would depress the dollar price to two cents below the mint parity, or to \$4.8465, at which rate gold would be imported into the United States in lieu of a direct purchase of dollars with pounds. This price was accordingly termed the gold import point. A rate outside these two gold points was almost impossible because as long as the more economical possibility of gold shipments existed, no one would pay more than \$4.8865 when buying pounds or accept less than \$4.8465 when selling them.

Under a gold standard anything which decreases the cost of gold shipment narrows the limits within which the exchange rate may fluctuate. (This spread would be practically eliminated if gold could be bought from one central bank and sold to another without any physical transfer taking place, a possibility that was realized to some extent during the interwar period because some central banks were willing to hold a portion of their gold reserves in the form of earmarked bullion in the vaults of other central banks.)

#### Semi-gold currencies

At various times a nation's money may be halfway between being on and off gold. Its central bank may stand ready to buy gold in unlimited quantities at a fixed price, but refuse to sell it; or the government may dabble in the gold market both as buyer and occasionally seller, but at a variable price, in uncertain amounts, and at its own initiative. These operations establish a partial link between the currency and gold. Consequently, the exchange rate between this currency and an unqualified gold-standard money follows certain principles, provided that gold shipments are unrestricted.

Purchase in New York					
100 gold bars. Fine oz. 100,000 at	_				
\$35.00 per oz	-		\$3.	500,00	0.00
Plus			44,	,,,,,	0.00
Buying co sicn of $\frac{1}{4}\%$ Freight at $\frac{1}{4}\%$	875.00				
Freight at 1/4%	875.00				
Insurance at 1/8%	437.50				
Boxes and packing charges	30.00				
Consular invoice	2.00				
Interest, 8 days at 1%	777.77			2,99	7.27
Cost of gold landed in Paris			<b>\$</b> 3,8	502,99	7.27
Amount Realized in Paris					
Fine oz. 99,998.30 at 1,050 francs					
per oz		Frs.	104,9	98,21	5.00
Less			•		
Assay charges of $\frac{1}{8}\%$ and 30					
francs per 1000 oz	134,247.77				
Trucking charges and customs			•		
entry in Paris	250.00				
Paris bank's handling commis-					
sion	900.00	•	1	135,39	7.77
Yield in francs		Frs.	104,8	62,81	7.23
Dollar Proceeds on Repurchase					
104,862,817.23 francs sold at 29.92					
each			\$3,	04,77	3.30
Net Profit on Transaction			S	1.77	

Let us suppose that the United States has an established policy of selling gold at \$35.00 a fine ounce on demand and that the Bank of France is currently buying all gold offered to it at 1,050 francs a fine ounce. Under the circumstances and assuming gold can be exported from the United States if necessary, the rate of exchange in Paris on New York can hardly fall below 1,050/35, which is equal to 30 francs to one dollar. For

example, if the rate in Paris on New York did fall temporarily to 29.92, arbitrageurs (individuals whose purchases and sales of exchange in different markets serve to equalize exchange rates in different centers) would ship gold to Paris, buy francs with the gold, and repurchase a larger number of dollars with the franc proceeds.

The above computations show the dollar profit, after deducting all costs, realized from gold arbitrage operations involving 100 bars of gold bullion.

The costs involved in gold arbitraging would have eliminated any profit if the rate on New York in Paris had risen to 29.935. A fall of over six centimes below the *gold parity* will instigate arbitrage operations and so increase the demand for dollars in Paris. This will raise the rate again.

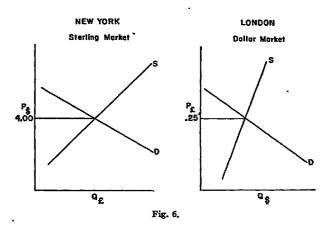
Exchange rates between financial centers must be compatible with the price of gold in the local currencies as long as arbitrage is possible.

#### Inconvertible paper currencies

(Inconvertible paper currencies exchange at rates that equalize their demand and supply in the foreign money markets of the world. National currencies are valued internationally like any other commodity. An exchange rate is nothing more than the price of one money in terms of another. An increase in the demand for a particular money will tend to increase its price, whereas an increase in its supply will tend to decrease its price) These principles should be familiar to any student of elementary economics.

Let us consider the exchange rate between the United States dollar and the pound sterling by way of example. In New York part of the foreign-money market deals in pounds sterling. There are dealers eager to sell pounds for dollars, and their offers constitute a sterling-supply schedule. There are other dealers eager to buy sterling with dollars, and their bids constitute a sterling-demand schedule. These two schedules are shown in Figure 6 where the horizontal axis refers to

quantity measured in pounds sterling and the vertical axis relates to price expressed in dollars. Simultaneously, there is a dollar market in London, as also shown in Figure 6. Herethe vertical axis shows price in pounds and the horizontal axis



represents quantity in dollars; in this case the supply-anddemand schedules show the different pound prices people will ask and bid respectively for different quantities of dollars.

The equilibrium dollar price in the New York sterling market is that which equates the number of pounds offered and demanded. In Figure 6 this is assumed to be \$4.00. Similarly the London market for dollars will be in equilibrium only at a sterling price that equalizes the number of dollars offered and demanded. In Figure 6 this is taken to be £.25.

The sterling price for dollars in London must be the reciprocal of the dollar price for sterling in New York. Arbitrage operations of foreign-exchange dealers will ensure this reciprocal relationship. Suppose the pound is priced at \$4.00 in New York and the dollar is priced at £.30 in London. Both these prices are too high. (The reciprocal of \$4.00 is £.25 and the

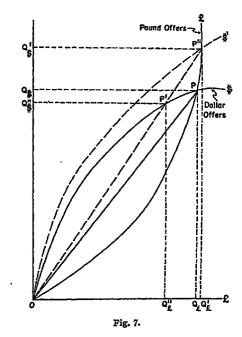
reciprocal of £30 is \$3.33.) Dealers will then sell dollars in London, resell the sterling proceeds in New York, resell the dollar proceeds in London, and so on until there is no longer any profit opportunity remaining. The effect of these sales is to shift the supply schedules in both markets to the right and thus lower the quotations in both markets also. Reciprocal rates must finally result.

The above discussion discloses that the dollar-supply schedule in London and the sterling-demand schedule in New York might be combined as a single dollar-offer (or perhaps poundasking) curve. Similarly, both the pound-supply schedule in New York and the dollar-demand schedule in London are really pound-offer (or perhaps dollar-asking) curves and could be combined into one such schedule. The New York sterling market and the London dollar market are nominally separated only because of spatial necessity: tracking cannot go on in the middle of the North Atlantic. Analytically, though, it would be much more convenient and realistic to treat these markets as one, and this is perfectly valid as long as the price quotations in the two submarkets are always reciprocals of one another.

Figure 7 differs from our earlier diagrams in that the vertical scale now shows the total number of dollars exchanged while the horizontal scale refers to the total number of pounds exchanged. The curve OS is the dollar-offer schedule. Any point on this curve shows how many dollars will be given up, by persons who have them, for how many pounds. This curve is steep at first, indicating that the acquisition of a limited number of pounds is extremely important, and that therefore a relatively large number of dollars will be exchanged for this small amount of sterling. However, the dollar-to-sterling rate, acceptable to those who have dollars to sell, falls steadily, but perhaps at a decreasing rate as the number of purchased pounds increases. The curve O£ is the pound-offer schedule. Its initial flatness indicates a premium sterling price for dollars when only a small quantity of the latter are bought.

At any one time there is only one exchange rate that can

achieve equilibrium, and this rate is the one at which there will be as many dollars being offered for pounds as there are dollars being sought by pounds. Diagrammatically, this occurs where the pound-offer and dollar-offer curves intersect; at this point



(P) there will be OQS dollars exchanged for OQ£ pounds. The exchange rate expressed as the dollar price of sterling will then be the quotient of OQS divided by OQ£. This rate of exchange is represented by the slope of the line OP. No other rate could achieve equilibrium under the circumstances. At a higher dollar price for sterling (as represented by the steeper line OP') people with pounds would be offering OQ£' of them

for OQS' dollars whereas people with dollars would be offering OQS'' of them for  $OQ\mathcal{L}''$  pounds. There can be only one equilibrium exchange rate with a given pair of schedules.

The exchange rate will alter only if there is a change in either the pound-offer curve or the dollar-offer curve. In either case there will be a new intersection point and consequently a new rate. The dollar-offer schedule will shift upward (that is, people with dollars are more anxious to obtain pounds with them than before) for any reason that causes an increase in the debit side of the United States balance of payments with Great Britain. A new dollar-offer schedule, such as OS' in Figure 7, here gives a new equilibrium rate represented by OP'', and OQS' would exchange for OQE'.

The curvature of these two offer-curves signifies a changing elasticity in the demand and supply of currencies. For example, more pounds will be bought at a lower dollar price and more dollars will be bought at a lower pound price. Is this elasticity in the demand for one currency by another likely to be high or low?

The best way to study this question is to recognize that the demand for another currency is largely a derived demand. A person does not buy pounds because he likes pounds, but because he wants to do certain things which can only be done if he owns pounds. If pounds were used solely to pay for the import of goods from Great Britain, the elasticity of the demand for pounds would be based upon the price elasticity of foreigners' demand for British goods. However, pounds may also be needed to service loans obtained in London during an earlier period; there will then be interest owing each year or quarter, and sinking-fund installments may be falling due.

# Triangular currency arbitrage

There are about 50 different national monies in the world today. Each of them has a dollar price. These different dollar rates must be compatible with one another if equilibrium is to prevail. There is a dollar price on the Italian lira, for

example; another dollar price on the Swedish krona; and an exchange rate between the lira and the krona. These three rates are compatible if, ignoring service charges, one can exchange one money for another, and then another, and finally buy the original quantity of the initial currency. This compatibility is brought about by arbitrage transactions.

Let us suppose a situation arises that is not an equilibrium one. It might be that the Italian lira is selling for \$0.045, the Swedish krona for 3.90 lire, and the dollar for only 4.8 kronor. Ignoring all commission expense in this case, a dealer in foreign exchange could buy lire with dollars, buy kronor with lire, buy dollars with kronor, and end up with more dollars than he started. Actual computations show that \$1,000.00 buy 22,222 lire at \$0.045 each. These 22,222 lire buy 5,689 kronor at 3.9 lire each. And 5,689 kronor buy \$1186.00 at 4.8 kronor each. The completion of these three transactions results in a profit of \$186.00 on \$1000.00. Put another way, a dollar can be bought for 84¢ if it is purchased indirectly via other currencies because this is the product of 0.045 × 3.9 × 4.8.

Foreign-exchange dealers are on the lookout for just such incompatibilities as these because the latter render a shortlived profit opportunity. Almost simultaneously the dealers will make the three purchases indicated above. These very actions lessen the profit margin. The increased dollar demand for lire increases their dollar price to perhaps \$0.05; the increased lira demand for kronor increases the latter's lira price to perhaps four lire; and the increased krona demand for dollars increases their krona price to perhaps five kronor. In this case the final result will be that \$1.00 buys twenty lire, a lira buys 0.25 krona, and a krona buys 80.2. These three exchange rates will be compatible because \$1,000.00 will now buy 20,000 lire, which will buy 5,000 kronor, which will in turn buy exactly \$1,000.00 again. The test of exchange-rate compatibility, ignoring expense, is whether the product of the various prices is unity. These last three rates were compatible because  $.05 \times 4.0 \times 5.0$  equals unity. Thus, a dollar that is sent on its rounds ends up as a single dollar and yields no net profit.

The possibility of making a profit from arbitrage transactions sets up a circular flow of funds from currency to currency. The direction of this flow is always away from the premium money toward the discounted money. The flow continues until the rates are once more compatible. This inspired flow of funds circulates in the opposite direction to any abnormal net movements in funds transferred for ordinary business reasons. For example, if the lira is selling at a discount only in terms of the dollar, this may be because the United States has an unusually large export balance to Italy and is collecting payment, in which case arbitrage operations, as already described, create a countervailing movement of funds from dollars into lire, and then back to dollars via some third currency.

However, it should not be imagined that arbitrage strengthens one money versus all other monies. This follows from the fact that arbitrage creates an abnormally large demand and supply of a currency at the same time. In the example already given, there was a large and novel dollar demand for lire, but there was also a large and novel krona supply offered for dollars. Accordingly, the dollar depreciated in terms of lire and appreciated in terms of kronor, and probably retained its customary valuation in all the many remaining currencies. If a nation's money is weakening, it will sell at a discount in all currencies, and arbitrage, will merely ensure that this depreciation is at a uniform rate in terms of all currencies.

# Forward exchange

Fluctuations in exchange rates involve risks to those making contracts in foreign currencies. These risks are especially great under independent currency systems. Even though these risks are not insurable in the usual sense, they can be avoided or hedged against by engaging in the buying or selling of future or forward exchange.

An individual may buy future exchange when the exchange

rate is lower than it is expected to be when foreign payments are to be made. The individual will acquire, without present outlay of his funds, command over foreign money at a specified future date. He will do so by contracting with foreign-exchange dealers to obtain, say 90 days hence, a certain amount of foreign currency against payment in 90 days at a dollar price stipulated now. On the other hand, if the present exchange rate is regarded as high, an individual who is to receive payment later on in foreign currency may protect himself against a fall in the exchange rate by selling future exchange. He may sell his future exchange to exchange dealers at a dollar price agreed upon when the contract is made.

Exchange dealers enter into such contracts not as speculators but as middlemen. It follows that whenever a dealer contracts to deliver future exchange, he must cover himself by simultaneously buying foreign currency at the present or spot rate of exchange. A future sale is offset by a present or spot purchase, and as a result of the spot purchase, the dealer exchanges a domestic balance for a foreign balance. The earnings on the foreign balance as compared with the return on short-term funds at home will determine the terms on which the exchange dealer will enter into forward exchange contracts. If foreign balances earn a higher rate of interest than shortterm funds at home, the dealer will sell forward exchange at a discount from the spot rate. This discount will be equal to extra earning abroad, less a commission. Conversely, if the short-term interest rate is higher at home than abroad, forward exchange will sell at a premium over the spot rate.

# A family of exchange rates

The foregoing discussion reveals that there is not a single exchange rate involving a single currency such as the dollar, but that there are a great many dollar prices for foreign exchange at any time because there are many different kinds of foreign exchange. First, there is sterling exchange, franc exchange, and so on. The dollar prices for these foreign curren-

cies will be compatible with their intercurrency exchange rates as long as triangular currency arbitrage is permissible, which means that if the dollar is appreciating, the New York price of all foreign exchange will fall by an equal percentage amount. However, there are different kinds of sterling exchange also, examples being sterling bank drafts, sterling bills of exchange, and pound notes. The dollar cost of a sight draft on a London bank is perhaps the most important sterling rate, and will be below the mint parity if the trend in payments is towards the United States and assuming that both currencies do have a gold standard. Time drafts of all kinds naturally sell for a little less than sight drafts. A trade bill will normally sell for less than a bank draft because of the greater risk. dental charges are also a consideration. A bill broker usually charges 1/2 of one per cent, a bank's service charge for its draft is likely to be about 1/4 of one per cent, and the cost of gold shipments is approximately 3's of one per cent between New York and London. These charges and costs differ in magnitude; consequently, the relationship of the prices of different kinds of sterling exchange to one another will differ very slightly over time, according to the ebb and flow of international payments.

# The Purchasing Power Parity Concept

The external value of a currency, especially if it is an inconvertible paper money of no intrinsic worth, should be related in some way to its internal purchasing power. A large part of the value of the French franc resides in its ability to command goods and services in France, and hence a portion of the foreign demand for French francs is derived from the demand for French exports. If the price of all goods in France were exactly to double so that the franc would only buy half as much merchandise, prospective importers of French goods would naturally tend to halve the currency price at which they would be willing to buy frances.

Through the agency of professional importers, the consumers

of each country are anxious to buy in the cheapest market. whether it be at home or abroad. Discovery of which market is the cheapest requires the restatement of foreign prices in the domestic currency in order that a direct comparison can be made. (We shall neglect the addition of customs and transportation costs.) Theoretically one might import a given commodity from France rather than buy it in the United States if the price were 380 francs in France, \$4.00 in the United States, and the cost of a franc were one cent. The effective price to an American of the French import is then \$3.80 (380 divided by \$0.01) which is 20¢ cheaper than the price in the United States. If this kind of price relationship extended over a wide range of important commodities, so that imports into the United States from France increased considerably, there would almost certainly be a large increase in the American demand for francs, and the latter money would probably appreciate in value.

It is a short step to proceed from these simple notions to the theory that an exchange rate should equal the ratio of the outlay required to buy a given set of goods at home as compared with what it would buy abroad. A representative collection of goods, such as bushels of wheat, tons of steel, gross of shirts, and so on, might cost \$1,250 in the United States and 100,000 francs in France. Some people have asserted that the proper exchange rate under these circumstances should be 1.25 cents for a franc, which is the reciprocal of 80 francs to one dollar. Such an exchange rate would provide a parity in purchasing power because \$100 would buy the same quantities of the representative goods in France as in the United States. This approach to the problem of equilibrium exchange rates is sometimes termed the absolute purchasing-power parity theory.

This theory, as stated above in its absolute form, suffers from several defects. A majority of the goods and services sold in one country are not in competition with their counterparts in another nation. Two obvious examples are houses

and haircuts. Moreover, because of freight costs and trade restrictions, the price of even an international commodity, such as graded wheat, need not be the same in different countries when expressed in one of their respective currencies. A price comparison of this kind will reveal that internationally traded goods do not sell at the same price in each market, but at a premium in the country that imports and at a discount in the nation that exports, and the prices of domestic goods can and will differ between the two markets by almost any amount. Also, some countries are considerable importers on balance whereas others are net exporters. The aggregate cost of a set of goods in an exporting country like Great Britain might appear high relative to that of Australia when the cost is converted into one of their respective monies, not because the pound sterling has a lower internal purchasing power, but because prices in the two economies are often separated by an intervening freight bill.

The comparative version of the purchasing-power parity theory is less extreme and concerns itself with the relationship between changes in purchasing power and changes in exchange rates. This approach, unlike the absolute form, does not say that the exchange rate should be equal to the ratio of the aggregate outlays incurred for a set of goods that is purchased in two different countries and expressed in their respective currencies. Instead, some past exchange rate is assumed to have been an equilibrium rate and is adopted as a base rate. Let us suppose that we are interested in the franc-to-dollar rate and that, in the base period before World War II, this was 30 French francs to one United States dollar. Since then the price level in France may have risen three times, so that the internal purchasing power of the franc has fallen to one third. In the United States prices have perhaps risen 1.25 times, so that the purchasing power of the dollar has fallen to four fifths of its previous amount. The increase in French prices is 2.4 times the increase in American prices. Therefore, if 30 francs

to a dollar was the equilibrium rate in the base period, this should now be increased 2.4 times to 72 francs to a dollar.

This idea has sometimes been set forth with all the apparent precision of a mathematical equation. This formula differs depending upon whether or not one is looking "outward" from one's own country; if one is looking outward, he would be concerned with the dollar price of a unit of a foreign money, and the equation would be as follows:

It is to be hoped that in view of the impressive appearance of this formula, the student will not be disillusioned to find that he cannot solve this equation or that the equation appears to disregard the complex nature of exchange rates and price levels.

(In the first place, it is almost impossible to know when the exchange rate is in full equilibrium, and, therefore, what period to select as a base. Second, most price indexes include a great many domestic goods and services that do not enter into international trade at all. Third, if special indexes which only include internationally traded goods are prepared, the likelihood of realizing the predicted equality is enhanced, but the causal relationship is left in doubt. Has the exchange rate moved in response to the price changes or vice versa? In this event one certainly cannot use the formula to gain an impression of what the exchange rate should be. Fourth, the formula requires one important statistical condition for its validity: that all prices in the index move in such a way as to avoid changes in the relations between prices. If the prices of both X and Y change, but X changes relative to Y, the pattern of demand for X and Y will so change that foreign expenditure on X and Y will be greater or less than before. The exchange rate will differ from that called for by the index-number formula. Actually, we know that when prices change they move, not in the same degree, but in dispersion, some rising while others fall.)

(Fifth, there is an implicit assumption that the foreign demand for a country's exports has unit elasticity. In other words the dollar outlays of United States importers for each and every French export is presumably unchanged whenever the dollar cost varies.) For example, if the franc price of champagne increases 10 per cent, Americans will buy 10 per cent fewer cases; or if the cost of francs fell 50 per cent, Americans would presumably buy and spend 50 per cent more francs for champagne.

(Sixth, and most devastating of all, the purchasing-power parity theory overlooks the demand and supply of foreign exchange that arises from other than trade sources. Long-term investment, transfers of interest and dividends, and short-term capital movements also occasion debits and credits, and hence influence the foreign money market. The exchange rate is a creature of the forces summarized by the balance of payments as a whole and not simply of the balance of trade.)

However it should not be concluded that purchasing-power parity is a useless concept.<sup>1</sup> It may serve as one of several

<sup>1</sup> Kindred versions of the concept sometimes are employed to confuse policy decisions. The confusion about the relation between national prices and exchange rates is well illustrated in President Roosevelt's Seventeenth Report to Congress on Lend-Lease Operations, p. 12, November 21, 1911. This Report tries to show that the official dollar-sterling exchange rate "understates the real financial value of the aid which we receive from our allies." The basis for this official view is that some British goods which were provided to our soldiers on "reverse lend-lease" cost less than comparable goods produced in the United States. Thus, the cost of an American parachute was \$165 00 but only \$13500 in Britain; aircraft tires of a given size cost \$35000 in the United States and \$16000 in England; and the cost of an Army field jacket was \$6.10 in the United States, but only \$5.60 in England. The Report cited nothing else in defense of the thesis mentioned." A moment's reflection, however, will reveal that there is confusion about the factors that are relevant to the determination of the appropriateness of a particular exchange rate. At best, the facts which were recited in the Report indicated only a presumed comparative advantage in production. Therefore, the implications of the position taken in the Report are even more misleading than the usual conclusions from purchasing-power parity reasoning.

guides in determining exchange-rate policy. This is an especially important consideration following major international disturbances. An illustration of this was provided by the French franc following the Allied invasion of France during World War II. The Provisional Government of France persuaded Britain and the United States to accept a rate of 50 francs to a dollar. This represented only a mild depreciation in the franc since 1939 despite the tremendous domestic inflation which had occurred. All the world, and especially American soldiers in France, knew that the French franc was greatly overvalued. The purchasing power of a dollar in France, after being converted into francs at the official rate. was only two thirds to one half of what it would then have been in the United States. This inequity was later rectified. Crude calculations of purchasing-power parity may even be considered by the International Monetary Fund (Chapter 32) when it comes to approve exchange rates.

# The Demand for and Supply of Foreign Exchange

It has been pointed out that an exchange rate is the price fashioned out in the foreign money market by the demand and supply of foreign exchange. The dollar price of a pound, abstracting any gold relationship, is in temporary equilibrium when the demand for pounds (at a given dollar price) is equal to the supply of pounds (at the same dollar price). However, this statement by itself is an incomplete description of how exchange rates are determined. The ultimate basis of exchange rates lies in the forces that give rise to a demand and supply of foreign exchange.

The strength and elasticity of the dollar demand for sterling is of practical as well as theoretical consequence. (Strength refers to the number of dollars that will be given up if necessary to acquire stated quantities of pounds.) For example, in Figure 7 the curve O\$ represents a stronger dollar demand for sterling than the curve O\$. (Elasticity concerns the increase in the number of pounds which will be bought, given a

certain strength of demand, when their dollar price falls.) An examination of Figure 7 shows that each of the three schedules has some elasticity. The curvature of the O\$ schedule, for example, indicates that more pounds will always be demanded at a lower price.

The degree of elasticity is the percentage increase in the demand for pounds divided by the percentage fall in their dollar price. For example, it might be that eight per cent more pounds would be demanded if their dollar price fell four per cent, and this would indicate an elasticity of % or 2.0. If the elasticity of demand for pounds is greater than unity, more dollars will be sold when more pounds are bought, and the dollar-offer schedules in Figure 7 will be rising. This is probably the usual case. However, under exceptional circumstances, the elasticity of demand for foreign exchange might fall below unity. This would happen if only two per cent more pounds were demanded when their dollar price fell four per cent. The right extremity of the OS schedule in Figure 7 depicts such a case because it eventually begins to fall, indicating that more pounds will only be bought for fewer dollars.

The strength and elasticity of the dollar demand for any and all foreign exchange is a derived demand, and hence is a reflection of a great variety of primary demands. One of these primary demands is the demand for imports. This element in the total demand for foreign exchange will become stronger if foreign-merchandise prices fall or domestic-merchandise prices rise. The elasticity of this portion of the demand will be influenced by the demand elasticity for imports. Accordingly, the dollar demand for sterling alone will be more elastic than for all foreign exchange because British goods are competitive substitutes for the products of other countries. A slight drop in the dollar price of sterling might shift United States purchases from France to Britain, thereby increasing the demand for pounds very considerably, decreas-

ing the demand for francs, and hardly affecting the over-all demand for both kinds of exchange.

Another portion of the demand for foreign exchange is occasioned by the desire to purchase securities owned abroad. If the effective rate of return on foreign-held securities increases, either because their prices fall or their payments rise, the dollar demand for the requisite foreign exchange will be augmented. This demand has little elasticity to it when change in the exchange rate is expected to be permanent. For example, a five per cent fall in the price of sterling may render the dollar cost of purchasing a British bond five per cent less, but the dollar equivalent of the interest will be five per cent less also, so that the rate of return is unaffected. Of course the demand for foreign exchange on investment account is much more elastic when the fall in the exchange rate is expected to be only temporary.

Foreign exchange is often needed to service debts contracted in some currency other than the dollar. This demand is exceedingly inelastic because the amount of foreign exchange required is practically constant. If the dollar price of foreign exchange rises, there will have to be a proportionate increase in the number of dollars given up, but there will be no slackening in the rate of foreign-exchange purchases due to the decline in its dollar price.

It is difficult to generalize about any nation's demand for foreign exchange. (Its demand will tend to be inelastic if it normally imports basic necessities that it cannot produce for itself, if it must service debts contracted in foreign monies, or if it has reparations to meet. Creditor nations which import heavily on balance probably have more elastic demands for foreign exchange, especially if they import luxuries or goods that they can make themselves. A single nation's demand for one other country's money is likely to be much more elastic than for all foreign exchange.)

It is unnecessary to discuss at length the strength and elas-

ticity of the supply of foreign exchange. The supply of foreign exchange is a counterpart of foreigners' demand for dollars. The amount of foreign exchange that they will give up to obtain a given quantity of dollars is a reflection of the strength of the foreign demand for dollars. In practice, the elasticity of this demand exceeds unity, and so more foreign exchange will always be offered for more dollars.

The comparative strength and elasticity of the counterdemands of different kinds of foreign exchange are of practical importance. Exchange rates will tend to be relatively stable in the absence of a gold standard or government control if the demand for and supply of foreign exchange are extremely sensitive to slight changes in the rate. These matters also have a welfare significance for the nations concerned. The extent to which a nation experiences or transfers the gains which arise from an increased foreign need for its exports, or the losses which result from a failure in an important export, are partly dependent upon the general character of the demand for and supply of foreign exchange. These points are explained in Chapter 9.

The exchange rate is one of the most crucial prices in the field of international economics, being both an effect and a cause. Exchange rate moves in sympathy with changes in the debits and credits in a nation's balance of payments, but its fluctuations alter the value of merchandise trade and the magnitude of other international accounts. An exchange rate is a nexus between national economies.)

# S ary

The present chapter first discusses the rate of exchange under the gold standard. Formally, the rate is fixed under this type of monetary standard, or rather fluctuations in exchange rates are confined within the narrow limits of the gold points. We saw that the various exchange-rate movements are synchronized by means of exchange or gold arbitrage, which is the process by which exchange rates are rendered compatible

in different markets. Arbitrage is simply based on the old idea of buying in the cheaper and selling in the dearer market. We also saw that forward-exchange transactions are the means by which traders hedge against the risk of exchange loss as a result of fluctuations in the exchange rate over a period of time. On turning to the purchasing-power parity doctrine, which has to do with exchange rates under paper standards, we saw that according to this doctrine the exchange rate is determined by the relative purchasing power of any two currencies. It was shown that this formulation is not strictly valid. The concept of purchasing-power parity remains of limited usefulness, however, as a rough index of the appropriate exchange rate during a period of marked change.

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# Chapter 8

# Balance-of-Payments Analysis

IN THE analysis of the balance of payments only a beginning is made when the items have been classified into debits and credits, as was done in Chapter 4. Classification is usually preliminary to analysis. In this chapter, therefore, we take up the analytical aspects proper of the balance of paymentsthat is, we shall discuss the interrelations between the various items of a country's international accounts. Balance-of-payments analysis can be used to reveal short-term conditions with respect to such matters as a country's international financial strength or weakness, its vulnerability to exchange-rate pressure, and in general the stability of the pattern of its current trade and service transactions with the rest of the world. reader will find in this chapter and in other parts of the book that the method of balance-of-payments analysis is a useful analytical tool which is being employed increasingly by governments and businesses in appraising a nation's short-term international economic position.

# Two Preliminary Matters

Before plunging into the analytical portion proper, a further word may be said about two preliminaries which were touched upon in Chapter 4. The first is that one must avoid the popular error of identifying the balance of trade with the balance of payments. A nation's balance of trade is simply the difference between the value of merchandise exports and the value of merchandise imports. The balance of trade is thus limited to a part of the debits and credits of a country's balance of pay-

ments. Since the balance of payments is an organic whole, it follows that the balance of trade, in and of itself, has no analytical significance. The trade balance, however, is usually the largest component of the balance of payments.

The second, and more important, preliminary matter concerns a feature of the balance of payments which the reader should always bear in mind. This feature is the necessary equality of debits and credits. In other words, the balance of payments always balances. It always balances for exactly the same reasons that an individual's accounts balance. An individual who spends more than his current earnings can do so only by drawing on past earnings (savings) or by borrowing. Similarly, a nation can make foreign payments in excess of its current receipts from foreigners (1) by drawing on accumulated foreign balances, (2) by exporting gold which has been accumulated at home, (3) by borrowing abroad, or (4) by some combination of the three. It is particularly important that this aspect of the payments problem be clearly understood.

# Significant Classifications

For analytical purposes it is necessary to emphasize the structural aspects of the balance of payments. In terms of structure and operational significance, the balance of payments is generally divided into three parts, as follows:

Current account
Short-term capital account
Long-term capital account

In the consideration of these accounts we have the choice of two methods. One would be to plunge directly into an analysis of a typical statement of the balance of payments, say the balance of payments of the United States in some recent year. But a real balance of payments is a rather involved statistical statement. Its structural complexity can be more easily understood after the reader has acquired an understanding of significant balance-of-payments relationships under simplified conditions. Therefore, we adopt a second method of considering the three major accounts in a country's balance of payments. We shall consider these accounts and some of the important relations between them under simplified conditions in the case of an imaginary country called Federalia.

# Some Hypothetical Illustrations

During year I' Federalia was confronted with the following balance of payments:

# Balance of Payments of Federalia, Year Y . (in million dollars)

Dcbits		Credits	
Imports of merchandise Shipping	5 5	Exports of merchandise Shipping Insurance and banking Tourist Interest and dividends	15 10 5
	150		150

There are several things that should be noted in the above balance-of-payments statement. First, the balance of payments balances. As was explained previously, every country's balance of payments is always in balance in the sense that credits equal debits. Secondly, Federalia's balance of payments in year Y balanced solely in terms of payments and receipts associated with goods and services exchanged for current consumption. That is, there were no capital, long-term investment, or purely financial transactions in the statement of Federalia's international accounts for year Y. Her condition was characterized by what is called current-account equilibrium. This phrase simply means that if the underlying conditions that prevailed in year Y were to continue unchanged, it would be possible for Federalia to go on year in and year out with a balanced current account. There is noth-

ing particularly significant about current-account equilibrium; it is merely one of several conditions that may characterize a country's balance of payments.

Suppose, however, that Federalia's balance-of-payments-position undergoes a change in year  $Y_1$ . It will be assumed that her citizens purchased, on the basis of a consumption pattern established in year Y, foreign goods and services in  $Y_1$  to exactly the same value, item by item, as in year Y; in addition, we shall assume that a certain amount of Federalia's savings were invested abroad instead of at home. The foreign investment, which shows up as an increase in exports in year  $Y_1$ , consists of the delivery of transportation equipment valued at 10 million dollars to Country A, in return for which Federalia receives 10 million dollars in long-term bonds payable by Country A. The new situation is illustrated in the following balance of payments:

# Balance of Payments of Federalia, Year Y<sub>1</sub> (in million dollars)

Debits		Credits	
Imports of merchandise Shipping Insurance and banking	125 5 5	Exports of merchandise Shipping Insurance and banking	15 10
Tourist Interest and dividends	10 5	Tourist Interest and dividends	20 —
Long-term capital in Country A	150 10		160
	160		160

Federalia's international economic position in year  $Y_1$ , like that of year Y, is a stable one which conforms to the underlying consumption-savings habits of her citizens. In year Y the underlying consumption-savings habits of citizens in Federalia were assumed not to involve the employment of any savings in foreign investment. (Savings that are used to finance

domestic investments obviously do not show up in the balance of payments.) What are the main consequences of Federalia's decision to undertake foreign investment in year Y1? First, there are income effects. Federalia will receive increased income in the form of interest payments from foreign borrowers. such receipts appearing in the current-account section of the balance of payments. Federalia can use this increased income to buy a larger total of foreign goods and services or she can re-invest the income in the form of additional foreign lending. No disturbances need result from Federalia's investment in year  $Y_1$  as long as either (or a combination) of two conditions are fulfilled: (1) that she use her increased international income to buy a correspondingly larger amount of foreign goods and services than in year Y or (2) that she re-invest the whole of the international income, deferring greater consumption of foreign goods until a later time.

In the second place, there are balance-of-payments effects. Federalia's investment in year  $Y_1$  has an impact on the balance of payments. The investment shows up in two places in the balance of payments—in the current account, where there is a credit balance or surplus equal to the loan (the export of transportation equipment), and in the long-term capital account, where there is a debit balance equal to the loan and to the credit balance on current account. Unlike year Y, the current account is no longer in balance. But as always, there is balance in the international accounts as a whole. The balance of payments as a whole is in equilibrium because the current-account surplus is associated with and equal to the year's new foreign investment. In other words, Federalia has financed increased exports (the current-account surplus) by granting foreigners a credit payable over a period of years.

When Federalia's current-account condition is related to her long-term capital account in the above manner, imbalance in the current account is of no consequence. Such a current-account condition is but a *derivative* of the basic decision to undertake long-term investment abroad, Federalia having pur-

posely committed herself to the transfer of current exports in exchange for future claims on foreigners. A current-account surplus that is offset by a like debit in the long-term capital account gives rise to the important case in which the balance of payments as a whole is in equilibrium. The case is characterized as one of equilibrium because Federalia's conduct contains no elements making for international economic instability. The foreign borrowers welcome Federalia's capital goods, and Federalia has voluntarily decided, consistent with a rational resource-use pattern, to let the borrowers have the goods on terms calling for repayment slowly over a period of years.

A word of caution is in order lest the reader draw unwarranted inferences from Federalia's equilibrium condition in year Y<sub>1</sub>. The point to be made is that no significance whatsoever attaches to the fact that the equilibrium condition of the balance of payments as a whole is associated with a current-account surplus, or still less, that it is associated with the popular notion of a favorable balance of trade. The currentaccount surplus is simply a derivative of Federalia's decision to undertake long-term exports of capital. What happens for instance, if we reverse the basic relationship and assume that Federalia borrows capital on long term from foreigners? Federalia's balance of payments would show a debit balance on current account, equal to the loan, and a credit balance on long-term capital account. In this case Federalia's long-term borrowing is associated with a current-account debit, or an unfavorable balance of trade. But there is no significance attaching to such an association. The only relationship that is of significance is that between the current account and the long-term capital account. To summarize the case of vear Y1, the important condition of equilibrium in the balance of payments obtains whenever the two accounts just mentioned are equal and offsetting.

Next consider further changes in Federalia's balance-of-payments position. Several years elapse after year Y1, during

which period the various items in the country's accounts change in size because of the growth of production and demand. In year  $Y_0$  the country returns to a position in which only current-account transactions take place, with the current account in balance. In the ensuing year  $Y_1$ , however, an important change occurs. Federalia purchases foreign goods and services to exactly the same value as in year  $Y_0$ , but foreigners shift some of their purchases from Federalia to other and more efficient producing countries. Federalia's current account is then characterized by an excess of debits over credits, and for the first time a new item appears in the balance of payments—an entry showing short-term capital imports by Federalia. This case is illustrated below.

# Balance of Payments of Federalia, Year Y<sub>7</sub> (in million dollars)

Debits		Credits	
Imports of merchandise	150	Exports of merchandise	120
Shipping		Shipping	
Insurance and banking	10	Insurance and banking	
Tourist	15	Tourist	5
Interest and dividends	5	Interest and dividends	25
			—
	190		180
		Short-term capital	10
	190		190

Apart from changes in Federalia's balance of payments which reflect the passage of time and growth in the several items, the one important change in the country's international economic position in year  $Y_7$  is that for the first time there is a credit item called short-term capital. Federalia either has acquired (borrowed) temporary bank balances in foreign countries or has drawn down on her own foreign balances for the purpose of meeting the deficit in her current account. This case, it may be pointed out, is a typical example of a short-run

adjustment to a disturbance in the balance of payments. The reader should note how this case differs from Federalia's balance of payments in year  $Y_1$ , shown on page 147. In year  $Y_1$  Federalia directs some of her savings into foreign investment, this action having been in accord with the underlying economic preferences of her citizens. That is to say, there was no basis for cumulative or snowballing movements. In year  $Y_7$ , however, Federalia's condition was characterized by cumulative or snowballing tendencies: she either had to borrow from foreigners or had to reduce her own foreign balances in order to be able to maintain a certain level of imports of goods and services. An adverse cumulative movement may have set in. This case is known as disequilibrium in the balance of payments.

Cumulative tendencies, as the words are here used, mean tendencies to which adjustments will have to be made sooner or later. In year Y. Federalia faced a deficit in her current account, not because foreigners had voluntarily and purposely relinquished command over current goods (Federalia's imports) in exchange for a promise by Federalia of long-term repayment, but because the situation in year Y<sub>7</sub> was one in which Federalia merely overbought in foreign markets, the excess being paid for by drawing on her exhaustible foreign reserves or by exporting gold or by temporarily borrowing on short term from foreigners. No one, least of all the responsible authorities in Federalia, would be so naive as to suppose that Federalia could persist indefinitely in piling up deficits on current account in the absence of equivalent imports of long-term capital. Federalia could do so only if foreigners frankly granted her outright gifts. When, therefore, a country is faced with cumulative movements of the sort described, it must face the fact that it will have to adjust its ways. This case is technically known as disequilibrium in the balance of payments: it is also known as an unfavorable balance of payments. (On the other side of the shield, countries that receive Federalia's gold, or are faced with reduced short-term liabilities to Federalia, or have greater short-term claims upon Federalia, find themselves in the opposite situation: they are experiencing what is called a favorable balance of payments. It is important to note that such countries are becoming more liquid at the same time that Federalia is becoming less so. Federalia, to use another analogy, is slowly approaching the condition of the corner grocer who, having purchased, let us say, an excessive inventory at high prices, discovers that his cash position is weak. The grocer will then find that he can get additional cash from his bank only if he straightens out his affairs in accordance with the terms imposed upon him by the local banker. But more on this general matter at a later point.)

# The Case of Disequilibrium

It is necessary to explain the paradox of the coexistence of disequilibrium and balance. (Balance is a necessary, everpresent attribute of a balance of payments, but balance at a given level of credits and debits may be achieved in one or more of several ways. Balance may be brought about under conditions that are basically stable—that is, conditions that conform to such basic elements as tastes, preferences, and relative ef-Or the balance that is achieved at a given level of credits and debits may be based on precarious conditions, as, for example, conditions that are essentially temporary) Thus an individual who has suffered a permanent loss of income cannot expect to maintain his old plane of living indefinitely by drawing on his savings, since these can be relied upon only to carry him through a necessarily short-lived "rainy day." Similarly in the case of an individual nation. If a nation's balance of payments balances only precariously, the condition is referred to as one of disequilibrium in its balance of payments. (The country will have to do something about the situation. It will either have to retrench on imports of goods and services or expand its exports or reduce its long-term foreign lending. The particular remedy or combination of remedies will depend upon the character of the disequilibrium. Only one thing is certain: the country will not be able merely to "coast along.")

# Equalizing and Autonomous Short-Term Capital Movements

At this point a word of caution is in order as regards the interpretation of statistics relating to short-term capital movements. Not all short-term capital movements mean the same thing. (Equalizing short-term movements, or the movements in the foreign field that correspond to the borrowing (or drawing down of previous accumulations) on the part of the individual whose current spending exceeds his current receipts.) are the type of short-term capital movements referred to on pages 150-151. Another type of short-term capital movement is known as an autonomous, or independent movement. (The word autonomous is used because the movements are unrelated to the condition of the balance of payments.) If an analogy may be used, we might say that an individual would be undertaking an autonomous import of short-term capital if, despite the fact that his current spending was exactly equal to his current earnings, he nevertheless engaged in short-term borrowing. His borrowing (holding idle balances in this case) would then be unrelated to the condition of his current incomeexpenditure pattern. (In the actual international world, shortterm capital movements typically are a mixture of equalizing and autonomous1 capital transfers. On the analytical plane, however, they are separate and distinct concepts)

Returning to the equalizing short-term capital import of Federalia in year  $Y_7$ , we might say that this import may be the result of temporary circumstances, such as an important crop failure in a leading export product. The case is one of disequilibrium, even if temporary, simply because the situation

¹ For example, Mexican industrialists, who frequently borrow funds on short-term from New York banks because they have to pay, let us say, only four per cent interest as compared with seven per cent that their own banks charge, are responsible for one type of autonomous short-term movement of capital

cannot go on indefinitely unless foreign nations are so foolish as to make annual gifts to Federalia equal to the current-account deficit. Moreover, the essence of the matter would not be different if gold movements instead of short-term capital were shown as a credit item. Sooner or later, gold-losing Federalia would exhaust her gold stocks. Unless she was then able to draw on her own foreign balances or to borrow temporarily from foreign banks (either of which constitutes a short-term capital import by Federalia), she would be forced to adjust herself to a less favorable basic international position.

The conclusion to be drawn from this discussion, therefore, is that a positive algebraic sum of short-term equalizing capital movements and equalizing gold flows indicates disequilibrium in the balance of payments. The short-term capital movements and/or gold flows are the active factors in the short-run adjustment process. Why, it may be asked, should the process be labeled one of adjustment if the condition is one of disequilibrium? The answer is to be found in what may be called the time-shape of the adjustment process. The case remains one of disequilibrium because the adjustment is only temporary, and the basic situation is thus inherently unstable.

It has just been stated that short-term capital movements and/or gold flows are the active factors in the short-run adjustment process, but are they the only factors? A moment's reflection will indicate that the answer is in the negative. A change on long-term capital account can also operate as an equalizing capital movement—that is, one induced by the condition of the balance of payments. If an individual owns his own home, he clearly can sell it in order to cover a current deficit resulting from the excess of current spending over current earnings, but neither an individual nor a nation typically carries out short-term adjustments by liquidating long-term assets. The long-term assets are quite properly regarded as sources of current income, and what is more, such assets are intended to be used as earning assets, available only in the case of an extreme emergency to meet a current deficit. There

are few cases, apart from periods of war, when nations undertake disinvestment of long-term capital to meet a current-account deficit.

# The Balance of Payments as a Whole

We turn next to the matter of the relations between the three parts of the balance of payments. For the sake of clarity, however, it will first be necessary to define these parts more sharply. The current account covers that portion of the balance of payments in which receipts and payments are connected with goods and services currently transferred—that is. transferred within the balance-of-payments period (usually a vear). Stated differently, the current account includes all receipts and payments that do not create a new capital claim or cancel a previously existing capital claim.<sup>2</sup> The long-term capital account includes all transfers of funds made for the purpose of "permanent" investment or which give rise to a long-term capital claim. This account is the investment section proper of the balance of payments; it indicates the amount of funds deliberately intended during the year to be tied up for a considerable period in foreign investment. Finally, the short-term capital account comprises all changes in gold or foreign bank balances, as well as all other short-term credits and debits.

If the requisite statistical data are available, the reader can use this threefold division to make a complete analysis of a country's international economic position during the preceding

<sup>&</sup>lt;sup>2</sup>It may be of interest to compare this definition with that given in the International Monetary Fund Agreement which was reached at the United Nations Monetary and Financial Conference of 1944. The Fund defines the current account as follows: "Payments for current transactions means payments which are not for the purpose of transferring capital, and includes, without limitation:

<sup>1.</sup> All payments due in connection with foreign trade, other current business, including services, and normal short-term banking and credit facilities.

<sup>2.</sup> Payments due as interest on loans and as net income from other investments.

<sup>3.</sup> Payments of moderate amount for amortization of loans or for depreciation of direct investments.

<sup>4.</sup> Moderate remittances for family living expenses."

year (or for shorter periods, if the data are available). (The threefold division permits, for instance, a broader analysis than is possible when the data are confined to only those international transactions actually resulting in international payments.) As a matter of fact it is sometimes incorrectly stated 4 that the balance of payments comprises only that part of the total of international transactions which gives rise to international payments. (There are a number of international transactions (that is, two-sided transactions as contrasted with unilateral action, such as default on foreign debt service) having immediate or future payment implications that would not be taken into account if current international payment is the criterion. For example, so-called tied loans, which have constituted an important segment of foreign loans made by the United States in the past few decades, would not appear in a balance-of-payments statement by the erroneous test mentioned above, simply because the proceeds of the loan are spent entirely within the United States. The funds flow from the lenders to the suppliers of equipment. Similarly, that part of a direct investment involving no foreign payment would also be excluded from the balance of payments by the same test. A true picture requires that every export of goods under an international loan must appear as a credit in the currentaccount section, whereas an offsetting amount must appear as a debit in the long-term capital account)

To recapitulate, the balance of payments, made up of the three conceptually distinct but interrelated accounts previously mentioned, is formally always in balance. The reason for this is that there are credits available to a country to offset all debits (payments) not (1) covered by current foreign receipts or (2) met from liquid reserves, such as gold holdings or

<sup>&</sup>quot;In the near future it is likely that quarterly balance-of-payments statements will be published by leading nations

<sup>&</sup>lt;sup>4</sup>Γ A Southard, Foreign Exchange Practice and Policy, pp. 8-9. New York: McGraw-Hill Book, Co., 1949

That is, loans the proceeds of which are spent entirely in the lending country and which, therefore, do not involve a transfer of funds to other countries through the foreign exchange market.

foreign bank balances. Apart from such offsetting credits as may be obtained by formal borrowing from foreign banks, offsetting credits may also be obtained by the simple device of having the seller lengthen the credit terms granted to a foreign buyer. The circumstance that statistics covering such operations usually are not readily available does not alter in the slightest the fact that such lengthening of credit terms constitutes a movement of short-term capital. Moreover, suppose that formal international payments, such as short-term bank advances, could not be arranged during a period in which there was a deficit on current account and that this deficit was offset by large-scale lengthening of credit terms by foreign suppliers. Under the suggested rule that nothing but international transactions resulting in international payment be included in the balance of payments, such a disequilibrium in the balance of payments would go unnoticed.

Thus far we have talked about the three separate sections of a nation's balance of payments and have made certain broad statements with respect to each. It is important that this discussion should not be interpreted to mean that equilibrium can obtain as a general rule with respect to any one of the three accounts that make up the balance of payments. (In the first place, current-account equilibrium for all countries simultaneously is economically undesirable because different countries have reached different stages in their economic development.) At one extreme are such highly developed industrial economies as Great Britain and such highly developed industrial-agricultural economies as the United States; at the other extreme are countries with underdeveloped industry and agriculture, such as India and China. (It follows, therefore, that a policy of current-account equilibrium for all countries would rule out a regular stream of investment (loans) from the highly developed to the relatively backward countries. All of the countries concerned benefit from such investment. Both sets of countries, however, would experience a lack of balance in their current account.) For example, the United States, as a lender to, let us say, China, would experience a credit balance in its current account by virtue of large exports of capital equipment to that country; for its part, China would have a debit balance on current account owing to large loan-financed imports from the United States. As a general rule, therefore, a policy of current-account equilibrium is undesirable.

There is a second type of interrelation between the several accounts that deserves attention. (In the case of economic relations between highly developed countries, balance in the current account together with balance in the capital account as a whole does not necessarily signify that balance-of-payments equilibrium obtains. The test may turn upon the matter of international liquidity. In terms of liquidity, a country with balance both in the current account and in the capital account as a whole may be in disequilibrium if it is "borrowing short and lending long." That is to say, if the country offsets a credit balance in its short-term capital account with a debit balance in its long-term capital account, it will be vulnerable should the owners of the short-term balances suddenly demand the return of their funds. Such a situation is not entirely imaginary. Substantially that type of difficulty was experienced by several European countries with serious consequences in the early stages of the great depression of the 1930's.)

(A third case of the interrelations between the several accounts making up the balance of payments bears a close kinship to the first case mentioned above. Reference is made to the situation in which a surplus or deficit in the current account is offset by an equal and opposite lack of balance on long-term capital account. Such a situation, as has been mentioned before, does not involve disequilibrium.) For example, if the United States has a credit balance on current account of 200 million dollars, equilibrium will be maintained during the period in question, provided that a debit of like amount is realized on long-term capital account. This type of situation, it may be pointed out, has been common in the history of creditor countries.

### Favorable and Unfavorable Balance

It should be apparent from the foregoing discussion that there are several ways of accounting for balance in a country's balance of payments, despite the fact that the country's underlying international position is characterized by disequilibrium. It follows, therefore, that no significance attaches to balance as The important matter is the particular way in which balance is achieved, or stated differently, the particular kinds of items in the balance of payments that offset each other. (When a set of balance-of-payments items is offset in one particular way (explained below), we may speak of a favorable balance of payments; and when the offsetting items are different, there may be an unfavorable balance. In each case, however, there is a necessary equality between credits and debits, since the balance of payments always balances. distinction between a favorable and an unfavorable balance of payments is important, owing to the different economic significance of the two types of balance. In particular, a favorable balance of payments is important from an exchange-rate angle.)

Consider the meaning of a favorable balance of payments relative to the exchange rate. (If Country A has a favorable balance of payments, it means that its banks are lending more to foreigners on short term than foreign banks are lending to A. or in the more inclusive sense, it means that A is accumulating gold and/or other claims on foreign countries.) Here, A is offsetting some credit items with debits in the form of accumulating claims on foreigners: A's position is said to be favorable because it has the claims on other countries. Under such circumstances Country A finds itself in a strong exchange-rate position. There is no pressure tending to depress its exchange rate relative to that of foreign currencies. Rather, the tendency is the other way because countries other than A are collectively less liquid to the extent that A is more liquid. If, on the other hand, the balance of payments is unfavorable, so that A is drawing down its foreign balances and/or borrowing from

foreign banks and/or exporting gold on balance, A will be in a vulnerable exchange-rate position and will find it difficult to maintain the value of its currency in terms of foreign currencies.

# The Balance of Payments and Exchange Control

Our discussion of the balance of payments should not be concluded without a word of caution concerning the practical difficulty of distinguishing between various types of balanceof-payments transactions. (The effective government control of current or capital-account transactions on a current weekto-week or month-to-month basis requires more detective work than economic analysis.) What is more, the reporting must be about as timely as the newspaper rather than as slow as the yearbook. Considering this last aspect first, it will be recalled that the balance of payments of Federalia was determined with respect to the experience of the preceding year (pages 146-151). Statistical studies to date also have related only to the experience, recorded or estimated, of the preceding year. In other words, only an ex post facto condition is revealed, and for most practical purposes, an ex post facto statement is regarded as adequate. However, if it is necessary for the implementation of some types of government policy to determine from week to week whether international transactions fall into one or another of the three balance-of-payments accounts, the requisite statistical reporting must appear at more frequent intervals than once a year-and the detective work should not be forgotten. (The accounting categories in a balance-of-payments statement include a mixture of elements. The sifting of this mixture cannot be accomplished without establishing a system of exchange control. Without exchange control, it is almost impossible to determine whether what appears to be a payment on a current-account transaction is really a payment on current account or on capital account. The reason for this is that under a system of unrestricted dealings in foreign exchange, purchases of foreign currency or

claims on foreign banks are not required to be offset by specific transactions in goods and services or in securities, nor are the detailed records which are necessary for control purposes kept by public authorities. Without detailed records, there is no assurance that remittances in connection with imports may not exceed the actual liability to the foreign supplier.) (The importer may build up a private nest egg abroad without disclosing the fact to his government if his remittance is padded so as to enable the exporter to place a part of his receipts in a bank account in the name of the foreign importer.) (On the other hand, if government exercises control over (1) the foreign exchange proceeds of exports, capital transfers, and so on and (2) the granting of foreign exchange, it can force individuals to prove the specific purpose for which foreign payments are requested and the actual monetary obligation connected therewith, and thus differentiate between current-account and capital-account transactions.) It should not be inferred from the foregoing, however, that exchange control is the only way in which to obtain adequate balance-of-payments reporting. For most purposes short of strict control over all foreignexchange dealings, adequate reporting may be obtained by the questionnaire method. In any case the reader should defer judgment on exchange control until he has read the relevant chapters on the subject.

### Summary

To recapitulate what has been said in this chapter: the concept of balance-of-payments equilibrium is a complex one, involving a study of the relations between each of the three accounts making up the balance of payments. Current-account equilibrium is an undesirable objective as a general rule as long as relatively backward regions exist (and they apparently will always be with us) and as long as the prospects of repayment of loans remains good. It was also demonstrated that a country was not in equilibrium if its long-term capital account was offset by an opposite balance in its short-term

capital account. By calling in their funds, the owners of the short-term balances could endanger the solvency of the country with large long-term foreign investment; on the other hand current-account imbalance is consistent with equilibrium if the country's long-term capital account offsets it. Disequilibrium in the balance of payments, therefore, boils down to a situation in which there are changes in a country's net position on short-term capital account (which includes, it will be recalled, changes mainly in gold holdings and foreign bank balances). These changes in the short-term capital account are both the index of disequilibrium and the elements that make possible short-run adjustments to disturbances in the balance of payments.

# A Note on the Balance of Payments of the United States,

It is appropriate to supplement the preceding analysis, which runs in terms of simple hypothetical illustrations, with a brief discussion of the balance of international payments of the United States during the six years preceding World War II. As may be seen from Table 19 on page 164, the breakdown by categories of receipts and payments is much more detailed than was the case with our previous illustrations. The data in Table 19 can be shown in even greater detail if necessary, and the increasing use which governments and international economic bodies are likely to make of balance-of-payments statements suggests that much greater detail will be shown in future statements issued by the United States Department of Commerce. Not only will future statements probably show many more details, but they will also have to be based on a shorter period than a year if they are to serve as guides to government action. We are likely to see quarterly statements of the balance of payments of the United States before long, but as regards both the amount of detail and the length of the period covered, changes will consist solely of matters of form. Although the analytical framework developed in the body of

this chapter will remain unaffected by changes in the form of the balance-of-payments statement, it should be clear that the analysis will have greater operational significance as more detailed and more frequent balance-of-payments statements are made available.

Let us consider some of the outstanding features of Table 19 The reader will notice that the structure of this balance of payments differs from that outlined earlier in this chapter. Thus, the three parts consist of (1) current transactions, (2) gold movements, and (3) capital transactions, and are in contrast to our threefold division of (1) current account, (2) shortterm capital account, and (3) long-term capital account given earlier. The difference, however, is only superficial. One may reconcile the form in Table 19 with our own classification merely by shifting some figures about. Unfortunately, Table 19 does not show transactions in outstanding securities (stocks and bonds) as a separate item. They are lumped instead among the long-term capital transactions, although this type of investment is often essentially short-term rather than longterm in character.6 For practical purposes the reader should regard the following in Table 19 as being essentially shortterm capital transactions: gold movements, short-term capital movements, a part of the unexplained items, and a part (indeterminate) of the so-called long-term capital movements which corresponds to (a part of the) transactions in outstanding securities.

There are several outstanding features of the current-account transactions of the United States during the period 1934-1939. Foremost is the persistent credit balance on merchandise-trade account, the so-called favorable balance of trade. (The reader will note, however, that if silver had been included among the merchandise trade items, and thus had been regarded as merely another commodity, the merchandise credit balances in 1935 and 1936 would have been converted into

<sup>\*</sup> The United States in the World Economy, pp. 106-107. Washington, D. C.: United States Department of Commerce, 1943.

TABLE 10 BALANCE OF PARMENTS OF THE UNITED STATES, 1934-1939 - (in million dollars)

						-
TTPE OF TRANSACTIONS	1934	1935	1936	1937	1938	1939
I. Current transactions						
A. Merchandise trade						
Receipts	2,133	2,283	2,456	3,319	3,094	3,177
Payments	1,655	2,017	2,423	3,084	1,960	2,318
<del>-</del>		<u> </u>	<del></del>		<del></del>	
Balance	+478	+236	+33	+265	+1,134	+859
B. Other current transac-					-	
tions						
Shipping and freight,						
net	63	-67	89	-130	-36	-6
Travel expenditures,						-
net	-137	-144	-180	-213	-173	-15
Personal remittances,						
net .	-132	-135	-148	-142	-115	- 10
Institutional contribu-						
tions, net	-30	-27	→28	33	-38	-4
Interest and dividends,						
net	+301	+366		+282		+31
Government items, net	~41	58		-95		-5
Silver, net .	-91	-396	114	-88	-206	-7
Miscellaneous adjust-						
ments and services.						
net	+56	+60	+74	+123	+80	+6
Total of other current						10
transactions, net	-137	-392	-251	-296	167	-12
Total of all current transac-						
tions						
Receipts	2,907	3.184	3,436	4,489	4.234	4,31
Payments	2,566	3,340				3,58
•					<del></del>	
Balance	+341	-156	-218	-31	+967	+73
II. Gold movements						
Net gold exports or im-						
ports	-1,134-	- 1,739	-1,116	-1,586	-1,973	-3,57
Net change in earmarked	-44				1 210	1 220
gold	-44	+10	-31	+312	+316	-1-000
Net gold movement	_1 170	_1 700	-1 147	-1 971	1.657	_3.01
ree Row movement	-1,116	-1,720	-1,147	-1,211	-1,037	-0,010
II. Capital transactions						
A. Long-term capital move-						
20						

ments

TABLE 19 (Continued)

TYPE OF TRANSACTIONS	1934	1935	1936	1937	1938	1939
Net flow through change in U. S. as- sets abroad Net flow through	+185	+116	+177	+276	+40	+113
change in foreign as- sets in U.S	-15	+320	+600	+245	+57	-86
Balance on long-term capital movements B. Short-term capital move-	<del>+</del> 200 °	+436	+777	+521	+97	+27
ments Net flow through change in U. S. as- sets abroad Net flow through change in foreign assets in U. S.	+96	+424	+55 +376	+45	+27	+21I +1250
assets in U.S	+120	7010	7070		7017	T1200
Balance on short-term capital movements Balance on all capital transactions	-		+431	+356	-	+1,470 +1,497
IV. Unexplained items	+415	+368	+157	+425	+249	+789

Source: The United States in the World Economy, p. 217. Washington, D. C .:

United States Department of Commerce, 1943.

Includes 30 million dollars representing the net transfer of funds in security arbitrage operations. These transactions cannot be divided between foreign and domestic securities in 1934.

debit balances, whereas the merchandise-trade credit balances of all other years would have been materially reduced.) Disregarding transactions in silver, the balance of trade of the United States was favorable in each year during the interwar period. It will also be observed that the United States regularly makes net payments to foreigners on account of shipping and travel services, with respect to personal remittances and in connection with contributions by religious, educational, and other institutions. On the other hand, heavy net receipts in the form of interest and dividends are also a standard feature

of our balance of payments.7 Considering the current account as a whole, it will be seen that credit balances were shown in 1934, 1938, and 1939, whereas debit balances occurred during the years 1935-37. For the whole period there was a net credit balance on current account of 1.635 million dollars. (It is important to point out that the current-account credit balance of this period, although moderate, no doubt was kept down by the extensive use of exchange control restrictions against American goods and services.) Abnormal imports of silver in 1935, the domestic drought of 1936 which led to augmented imports of grains, and the great increase in raw material imports associated with the minor industrial boom of 1937 were the principal factors making for the debit balances on current account during this three-year period. Incidentally, the sharp upturn in American imports in 1937 is a striking example of the way in which increased domestic business activity helps to improve the trade position of foreign exporting countries. We shall have more to say about this matter at a later point in this book.

The long-term capital account logically should be considered next. On the basis of the net credit balance on current account of 1,635 million dollars during 1934-1939, one would expect to find that the United States was a net lender on long-term account during this period. Actually, however, the United States was a net long-term borrower to the extent of 2,058 million dollars. In striking contrast we were a net long-term lender of 4,158 million dollars during the six-year period 1924-1929. In other words there was a perverted balance-of-payments relationship between our current account and our long-term capital account. This results in part from the inclusion of an indeterminate quantity of essentially short-term transactions in outstanding securities, as shown above, in the long-term capital account. In the main, however, it re-

It should be borne in mind that the statistics of net receipts of interest and dividends shown in Table 19 take account only of interest and dividends actually paid. If the receipts figures included interest payable but not paid—that is, interest in default, the net receipts would be very much larger.

sults from the unwillingness of American investors to lend more freely to foreigners because of the heavy default record in the early 1930's.

We turn, finally, to a consideration of the short-term capital sector of the balance of payments. In terms of Table 19, this sector consists of the category labeled short-term capital movements plus the category entitled gold movements. For the period 1934-1939 the net inflow of short-term funds reached the extraordinary total of 13,886 million dollars, of which 9,991 million dollars consisted of net gold imports and 3,895 million dollars of short-term capital as such. The bulk of these funds really represented "hot" money seeking temporary refuge in the United States. That this was so is clearly revealed if one compares the sum of (1) the net credit balance on long-term capital of 2,058 million dollars, (2) the net credit balance on current account of 1.635 million dollars, plus (3) a part of the net credit in the category unexplained items (which consists mainly of unrecorded capital transactions) of 2,403 million dollars, or a total of 6,096 million dollars, with the figure of 13,886 million dollars. In other words, during the period 1934-1939 foreigners sent us at least 7,790 million dollars (13,886 million minus 6,096 million) more than was necessary to pay for (1) net purchases of American goods and services and (2) net purchases of American-held investments. The surplus of funds sent to us was probably closer to 9.000 million than 7,790 million dollars, since the category called unexplained items no doubt consisted mainly of unrecorded short-term capital movements. This movement of refugee funds, harmful alike to capital-receiving and capital-losing countries. is without parallel in history. It is small wonder, therefore, that the outside world is bent on closely controlling in the future the movement of capital funds.

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### Chapter 9

# International Equilibrium

ALTHOUGH the preceding chapter made frequent reference to the need for adjustment to disturbances in the balance of payments, the character of the adjustment process was not discussed in detail. We must now concern ourselves with this process. Our purpose will be to show how two or more national economies mesh together, or stated differently, we shall try to account for the steps by which international equilibrium is restored following a disturbance in the balance of payments. The discussion will be in terms of simplified conditions in order to avoid unduly complicating the analysis. We shall assume that adjustment is achieved through the play of market forces rather than by such direct government interference as exchange control.

#### Adjustment under Stable Exchange Rates

The Role of Price Changes. (Under a system of fixed reserve ratios and stable exchange rates,)the quantity of money in each country is determined basically by the condition of the balance of payments because deficits or surpluses in the balance of payments are settled by transfers of gold or money funds. Take the case that shows this transfer most clearly, the old gold-specie standard. Under such a standard, where domestic money consists of gold coins, there is really no distinction between national and international currency. Gold is used for the settlement of any discrepancies in the balance of payments. The country with an unfavorable balance of payments simply loses gold, suffers a contraction in its money supply, whereas

the nation with a favorable balance of payments receives gold, and so expands its supply of money. Apart from the obvious case of domestic hoarding, the money supply is directly governed by the state of the balance of payments under a gold-specie standard.

(In this case the adjustment to a disturbance in the balance of payments operates through changes in the quantity of money, which in turn produce directly proportionate changes in prices)—that is, a country with an unfavorable balance of payments would lose gold, suffer a reduction in its prices because there would be fewer units of currency exchanging for goods, and increase its exports (since foreigners would find this country's exports to be cheaper than before). (The reverse reactions would set in in the case of the country with a favorable balance of payments. Gold flows would thus keep the economies in continuous adjustment.)

(Under a gold-standard system in which the domestic circulation consists of bank notes and deposits, the relationship between the domestic money supply and the balance of payments is less obvious, but is basically the same as in the case outlined above. If the country experiences an unfavorable balance of payments, its central bank is supposed to release gold for export against payment to it of domestic currency. The supply of money is thus reduced. The central bank is supposed to be governed by its reserve ratio—that is, the ratio of gold to its note and deposit liabilities. With a ratio of 25 per cent, for example, any net decrease in its gold reserve is supposed to create a fourfold contraction in the total monetary base.

(How does the central bank decrease the money supply with every decrease in its gold reserve? It uses two basic methods? The first is to change its discount rate, or the price it charges other banks for borrowing from it. Under the circumstances being discussed, the discount rate would be raised, thereby making borrowing from the central bank less attractive. The second method is that of selling its own securities in the open market. Such sales absorb funds from active circulation, re-

duce the reserves of commercial banks, and force the latter either to borrow from the central bank (at a higher discount rate) or to contract loans to their customers. The net result as far as the balance of payments is concerned is the same as in the case of the gold-specie standard. Citizens of the country now contract their imports of goods and services, and expand their exports. Meanwhile, citizens of other countries are expanding their imports relative to their exports. This reciprocal action and reaction serves to restore equilibrium in the balance of payments.

(The above discussion represents a boiled-down version of the classical view of the mechanism of adjustment to disturbances in the balance of payments. At bottom the mechanism consisted of a system of changing the volume of domestic money in accordance with the condition of the balance of payments. But did adjustment actually take place along the lines indicated by the classical analysis? It did in the case of some countries for certain periods, principally during the nineteenth century. Experience during the present century, however, suggests that the older analysis needs to be supplemented by considering income effects that result from changes in the balance of payments.)

Income Changes Considered. The preceding pages show how, under a system of stable exchange rates, adjustment to disturbances in the balance of payments is based upon price changes. The price changes are supposed to stem from increases or decreases in the stock of money as this stock is determined by the condition of the balance of payments. Changes in the latter, however, affect not only the supply of money, but also the level and distribution of income, and hence consumer and business expenditure. The net result is that the demand for imported and domestically produced goods is affected by price and income changes.)

We may illustrate the role played by income changes by considering the impact of a favorable balance of payments on current account that results from an expansion of exports.

This current-account surplus will generate additional income without simultaneously increasing the supply of goods available for purchase within the country. Additional income is earned in the export industries, and perhaps only a small fraction of this increased income will be spent on imported goods. The bulk will be spent on domestic goods. General activity increases under the stimulus of this augmented spending. Workers in domestic industries who receive additional income will in turn spend some fraction of it on imported goods. The successive spending of additional incomes originally earned in the export industries will serve to increase imports and have the effect of offsetting the expanded volume of exports. However, some part of the additional income will go into savings, and unless these savings are offset by additional investment, there may be no net increase in domestic income, in which case imports will not rise at all or not enough to offset the expanded volume of exports. As a rule, however, the improved domestic spending which results from the initial expansion of exports induces a rate of domestic investment that tends to absorb the additional savings. Opposite changes take place if the initial development is a current-account deficit arising from an expansion of imports. We thus can account for a mechanism of adjustment operating through changes in income and demand

### Adjustment Via Exchange Rate Changes

A nation faced with an unfavorable balance of payments may also seek to adjust its position by altering its exchange rate. The preceding pages of this chapter treat the case in which a nation's exports rise because of a drop in their prices or because of an increase in foreign demand. But an expansion of exports may also be brought about by a policy of exchange depreciation—that is, a fall in the foreign value of the currency. If country X's currency had been worth five units of our currency, but now can be had for four units, X could probably expand its exports. By means of such a policy, how-

ever, X secures for its export products only a larger share of a given foreign demand. This means that trade is diverted from other countries to X, or in other words, that X's improvement is at the expense of the outside world. At the same time X tends to direct the expenditure of its citizens from imported to domestically produced goods because foreign goods now cost more than before in terms of local currency. X should be able to rectify its balance-of-payments position very easily by such a policy, assuming that other countries do not retaliate, since its debits are reduced while its credits are increased.

(Why do not nations always attempt to effect needed adjustment by depreciating the exchange rate? The answer is that other countries generally regard the move as a device to obtain an export surplus at the expense of the outside world.1 Moreover, experience supports this contention because the degree of depreciation usually effected is greater than is warranted by strictly balance-of-payments considerations. No scientifically accurate technique is available by which to measure in advance the precise degree of currency depreciation required solely to restore equilibrium in the balance of payments method of trial and error must be employed.) Nations generally overdepreciate their currency because depreciation is looked upon as a multipurpose tool, with the relief of domestic unemployment (by way of an expansion of exports) probably bulking larger in the framing of policy than the more modest needs of balance-of-payments equilibrium. (Moreover, exchange depreciation as we have known it typically results from unilateral instead of truly international action. The result is that other nations often feel that the depreciating country's difficulties do not even warrant the use of exchange depreciation.) For instance, the depreciating country's troubles may

<sup>&</sup>lt;sup>1</sup> It should not be assumed that all export surpluses provide leverage for our own employment at the expense of the rest of the world. Where the export surplus is the effect, rather than the cause, of foreign long-term lending, and where such lending does not materially reduce domestic investment, the export surplus may give leverage to employment in both the exporting and importing countries.

arise simply because of an overambitious public-works program at home, which necessitates an abnormally large volume of imports besides increasing the costs of the export industries, or because the country is maintaining a large and expensive military establishment in colonial areas or in satellite countries. Other countries are naturally inclined to take the view that the depreciating country should limit its imports or curtail its foreign military expenditures rather than attempt to increase its proportion of world trade.

(Briefly, then, the basic trouble with exchange depreciation as a tool of adjustment is that the rate of depreciation is generally excessive. Depreciation usually degenerates into a beggar-thy-neighbor policy. To be fair and effective, the correct amount of depreciation, unfortunately not calculable in the existing state of knowledge, should be imposed at one fell swoop. An overcautious policy of depreciation in driblets will not do because foreigners will withhold orders from exporters in anticipation of additional cuts in the exchange rate. Such an overcautious policy may only hasten further depreciation, and so on in a vicious circle)

#### Equilibrium and the Rate of Exchange

(Equilibrium among national economies is something which is achieved only infrequently, yet it is a condition toward which international economic forces are constantly tending. What equilibrium requires is a set of balanced relations between prices (including exchange rates), incomes, and employment) (Analysis of the problem requires the consideration of such diverse elements as wage rates in different industries, interest rates in different countries, the state of international competition, the rate of development of backward areas, the presence or absence of competitive exchange depreciation or the bullying of small economies by large nations, and the degree of restriction placed upon the movement of goods between nations.) The mere enumeration of these categories serves to

indicate that the scope of equilibrium analysis is such as to preclude detailed treatment here.

Perhaps the reader may obtain a less nebulous idea of international equilibrium if the discussion is confined to one of the most crucial prices, the rate of exchange. It will be recalled that the preceding chapter contains several references to the equilibrium rate of exchange. In the literature on the subject it has been customary in the past for writers to describe the exchange rate that obtains when there is equilibrium in the balance of payments as THE equilibrium rate of exchange. (The absence of gold and/or equalizing short-term capital movements has been held to mean that the rate of exchange existing at the time is the equilibrium rate.) As is so common in the older literature of economics, (this characterization is correct only under the limited set of conditions of full employment and long-term stability of trade barriers.)

When there is serious underemployment in a particular country, a reduced level of national income will serve to reduce import demand, and thus operate as a substitute for gold or capital movements. In such circumstances the mere absence of gold and/or short-term capital movements is not a meaningful criterion of equilibrium. Similarly, even under conditions of full employment the balancing of a country's external accounts by means of increased import restrictions (such as higher tariffs, quotas, or exchange control) or export subsidies does not mean that the exchange rate existing at the time is the equilibrium rate. All that can be said about the balancing of the accounts is that there has been a forced balancing of foreign receipts and payments.) A satisfactory definition of the equilibrium rate of exchange would be the following: (An equilibrium rate is one that keeps the balance of payments (exclusive of gold and equalizing short-term capital movements) in equilibrium over a period of at least two or three years without restrictions on imports in the form of serious underemplovment or additional trade barriers. In any concrete case.

therefore, it is necessary to determine at least the four following elements before a judgment can be made about the character of the exchange rate: (1) the presence of gold and equalizing short-term capital movements, (2) the length of time the current and long-term capital accounts have been in balance, (3) the level of employment, and (4) the extent to which additional barriers to trade have been imposed by the country in question in the recent past. It is then and only then that the analyst will be in a position to render a judgment concerning the equilibrium character of the exchange rate.)

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## Chapter 10

# Monopoly Principles and International Trade

The theory of monopoly is applicable to a number of problems in international trade, one of which relates to schemes for organizing small producers who collectively supply a significant fraction of the world supply of some good. Another problem concerns the effects of dumping upon the domestic economy, and a third problem centers around the exploitation of a country's monopsony power. There are also other problems with which modern monopoly theory is equipped to deal.

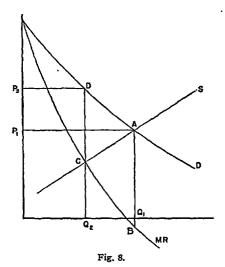
# Organization of Suppliers into a Regional Monopoly

Certain areas of the world have a partial monopoly of some one or more goods entering international trade. However, where the good in question is produced by a great many independent suppliers, this potential monopoly power may remain unexercised without local government aid.) This was typically the situation regarding tree rubber in Malaya and the Netherlands East Indies prior to enforcement of restriction schemes by the British and Dutch governments. The details of this prewar plan to raise rubber prices need not detain us here. The importance of this scheme lies in the economic principles involved because these also are applicable to a number of other commodities and regions.

Figure 8 is a hypothetical illustration of some of the relationships involved in the rubber-control scheme to which allusion has just been made. The D-curve is the demand schedule of the rest of the world for crude-rubber exports. We are as-

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suming no local demand, and in actual fact this was relatively insignificant. The supply schedule of crude rubber is represented by the S-curve. This schedule indicates the extra output that will be evoked by an increase in price, and the schedule comprises the minimum reservation prices placed by growers on successive units supplied. The equilibrium price.



in the absence of any plans to restrict output, would presumably be  $P_1$ , and the quantity of crude rubber produced and exported would be  $Q_1$ .

The negative inclination of the world-demand curve for this region's crude-rubber output shows that it must produce a significant fraction of the total international supply. As a consequence, and this is also indicated by the demand schedule's slope, the crude-rubber suppliers of this region could collectively exercise considerable influence over the world price.

One obvious method of raising price is to restrict output.

In this particular instance there are so many thousands of independent growers and the possibility of clearing additional acreage for rubber-tree cultivation is so considerable that any voluntary association of current producers would have little power. Attempts by such an association to agree on a higher price and lower output would be undermined by the competitive supply which would soon come flooding in from producers outside the control scheme. Circumstances of this nature make it imperative that any plan for restricting output be supported by government action.

Specifically, the government authority in the territory might have required all growers to enter the producers' association and to abide by the individual quotas it sets; or the government might here undertake to license all growers and set output allotments for them. (The same effect could be had by instituting a system of export permits.) Still another possibility, but one hardly calculated to appeal to the politically powerful growers, would have been to establish a heavy export tax. In the case of rubber prior to World War II, primary reliance was placed upon output allotments in order to limit the total supply. The British and Dutch governments saw to it that these quotas were observed.

(The theoretical problem is to determine the price and output level that will maximize the collective profits of the numerous growers.) Profits are the difference between total receipts and total costs. Therefore, it follows that profits are increased by contracting output if the particular units no longer produced occasioned more additional costs than additional receipts. The logical way to find the most profitable output is to compare the contribution to total receipts and to total costs of each separate unit of output. If the "last" unit adds more to receipts than costs, total profits are improved and expansion is financially desirable. Conversely, if the last unit adds more to costs than receipts, then output should be contracted until the marginal (additional) costs are equal to the marginal receipts. Ascertainment of marginal costs and receipts is the

first step in determining the most profitable output for the growers as a whole.

The marginal costs of production are given by the collective supply schedule. Under circumstances of individual competition—that is, where no one supplier alone has any influence over price—each producer will expand his output up to the point where the cost of the last unit is equal to the price prevailing in the market. All suppliers are assumed in theory to react in this manner. Accordingly, the collective supply schedule, which is nothing more than a summation of numerous individual supply schedules, indicates the marginal costs of the entire group of growers.

Marginal receipts from sales can be derived from the export demand schedule. Mathematically, marginal receipts are the change in total receipts divided by the change in quantity, sold. Total receipts can be found by multiplying the prices and related quantities given in the demand schedule. The table on page 181 illustrates one way of determining marginal costs. The first two columns represent an imaginary demand schedule and are the basis of the calculations in the subsequent columns to the right.

What does this table show? It indicates that, between a price of 80¢ and 70¢, for example, each additional unit sold occasions, on an average, an extra 40¢ to total receipts. Many readers will certainly wonder at this because they will suppose that if the price is 75¢, for instance, each extra unit sold will contribute an additional 75¢ rather than about 40¢. The point is that inasmuch as the demand schedule is negatively inclined, an extra unit cannot be sold unless price is lowered slightly. However, in the absence of discrimination all units must be sold at the same price. Therefore, the slightly lower price, which will increase sales, will have to be extended to all buyers, and so there is a loss in revenue as well as a gain. The table further shows that 1,000 extra lb. can be sold by lowering the price from 80¢ to 70¢. This yields a gross gain in receipts of \$700.00, but there is an offset of \$300.00 for the 3,000 lb.

which could have been sold at  $80 \c eng$  in any case. Now, however, each must be sold for  $10 \c eng$  less. The net increase in receipts is therefore only \$400.00, or  $40 \c eng$  per lb: This explains why, as is shown at the bottom of the table, an increase in sales that is instigated by a lower price may sometimes result in a decrease in total receipts.

TABLE 20

Derr	VATION OF M.	arginal Rev	ENUE FROM A	DEMAND SC	HEDULE
1	2	3 TOTAL	4	5	6 MARGINAL
PRICE	QUANTITY	REVENUE	$\Delta$ in Tr	Δινο	RECEIPTS
(DEMAND	SCHEDULE)	$(1 \times 2)$	(FROM 3)	(FROM 2)	(%)
\$1.00	1,000 lb	\$1,000	\$800	1,000 lb	\$.80
.90	2,000	1,800	Şavu	1,000 10	9.00
	2,000	1,000	600	1,000	.60
.80	2,000	2,400	500	2,000	.00
	-,	_,	400	1,000	.40
.70	4,000	2,800			
	•	-	200	1,000	.20
<b>.60</b>	5,000	3,000		=	
	-	*	0	1,000	.00
.50	6,000	3,000			
		•	200	1,000	20
.40	7,000	2,800			

The marginal receipts schedule (MR) in Figure 8 is derived from the demand schedule in the manner explained immediately above.

(The most profitable output and price for the rubber growers as a whole will be that at which their collective marginal costs and marginal receipts are equal.) In terms of the diagram this will be determined by the intersection of the S and MR-curves, and will yield an optimum price of  $P_2$  for a quantity of  $Q_2$ . This may be brought about by the governments' restricting output to  $Q_2$ . The price will then rise to  $P_2$  of its own accord.

Control schemes cost money to administer, and it may, therefore be questioned whether the increase in the profits of rubber growers justifies the expense of restriction according to even a financial reckoning. Unfortunately there is no a priori means for gauging the expense of administration. However, the increase in growers' profits is ascertainable from the diagram: it is the area ABC. The explanation of this is simple: The area below the supply curve, between A and C, represents the decrease in total costs resulting from a contraction of supply. The area below the marginal-revenue curve, between B and C, represents the reduction in total receipts occasioned by a lower volume of sales. The difference is the increase in collective profits.

What is the burden of such restriction on economic well-being? There are theoretical reasons for supposing this burden to be unduly severe. The consumers, who hitherto were not considered in the analysis, suffer a loss in their surplus amounting to ABCD because the area under the demand schedule, between A and D, represents loss of utility, and the area under the marginal revenue schedule, between B and C, represents the reduction in buyers' outlays. Against this very considerable loss in consumers' surplus, one can set only the paltry gain in growers' profits of ABC. Theory tells us that there has been an over-all economic loss valued in monetary terms at about ACD. The method of evaluation employed here assumes that the domestic growers as a class are not notably richer or poorer than the man body of foreign users.

Here is an international conflict of interest. The growers in one region are benefited. The users in other countries are injured disproportionately. It is, therefore, not surprising that consuming nations often seek representation on the international committees that determine outputs and prices of some products.

#### Incidence of Dumping on the Home Economy

(International dumping can be defined as selling abroad for lower net unit receipts than the price charged on domestic sales.) An example of international dumping would be an American steel company having a Pittsburgh price of \$50.00 a ton, a delivered price in Liverpool of \$55.00 a ton, and freight costs of \$10.00 from Pittsburgh to Liverpool. (This practice, which has not been uncommon in the past, raises two important questions: Why do companies engage in dumping? What is the economic incidence on the home economy?)

(A company will engage in international dumping if the various national markets exhibit different demand characteristics and if there is no likelihood of buyers in the low-price market reselling to the higher-priced market.) Let us consider the latter aspect first. (National markets are usually kept separate either by transport expense or government deterrents. Many companies can dump abroad with impunity because the goods cannot be profitably reimported over the domestic tariff.)

Unational markets can be said to possess different demand characteristics if the elasticity of demand at a common price is different in the various markets.) The ratio of marginal revenue to price will be higher in the more elastic market. For example, at a common price of \$50.00 marginal revenue might be only \$20.00 in market A, but \$40.00 in market B; the ratios of marginal revenue to price are then 0.4 and 0.8 respectively, and market B is more elastic.

The significance of this difference in demand elasticity will soon be apparent. A simple monopolist—that is, one who does not discriminate—will sell at the same net price in each market. Let us suppose, ignoring freight costs, that the simple monopolist is located in A and sells in both markets at \$50.00. This simple monopolist, providing the A market is protected by a high tariff, is overlooking a profitable opportunity to discriminate by dumping in the B market. He could, under the assumption of the preceding paragraph, increase his net receipts and profits by about \$20.00 if he would divert one unit of output from the market A to market B. This follows from the fact that marginal revenue is \$40.00 in B and only \$20.00 in A. Relocation of output between the two markets should be continued, if profits are to be maximized, until the

marginal revenue is the same in each market. There will then be a considerable price disparity between the two markets. Increased sales in B can only be secured by depressing the quoted price below \$50.00. On the other hand, higher prices can be charged in A if that market is called upon to absorb less.

A discriminating monopolist, in contrast to a simple one, equates the *marginal receipts* obtained from different markets, and this action will of itself create *price* disparities. If the foreign market tends to be more elastic than the domestic, the producer will sell abroad at a lower net price. This constitutes international dumping as here defined.

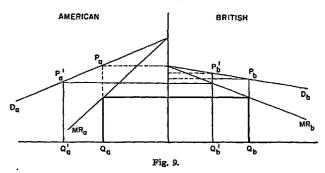
(International dumping affects economic efficiency as well as financial profits.) There are sound theoretical reasons for supposing that dumping leads to excessive exports relative to local use. Such an assertion invites elaboration.

National production, neglecting investment, leads to consumption directly and indirectly. The direct way is home production for home use. The indirect means is to export production in order to pay for usable imports. If steel exports realize one million dollars' worth of foreign exchange, the obvious question is whether the imports that can thereby be financed will possess a greater or smaller domestic use value than the steel tonnage that was actually sent abroad in payment. It can be seen from this that the allocation of any product to direct or indirect consumption is an extremely crucial one as far as the home economy is concerned. In a free enterprise economy this highly important division is determined according to the self-interest of private business in the manner just described. Will this division conform to the general interest of the nation?

Let us imagine a combination of American steel companies that sell in both the American and British markets. Demand conditions in the two markets induce the companies to practice dumping. A fairly high price can be charged in the American market because of protection owing to tsriffs and freight. Prices in the British market are low owing to absence of pro-

tection. The demand in the British market is also relatively elastic because of the many alternative and adjacent sources of supply in France, Sweden, Germany, and so on.

Figure 9 represents such a situation. The quantity scale in the American market reads from right to left, and the demand and marginal-receipts schedules for the British market have had freight costs deducted. The profit motive will lead to an



equation of marginal receipts in both markets. Consequently, assuming that a given total output represented by  $Q_aQ_b$  must be allocated,  $Q_b$  units will be sold in the American market for  $P_a$ , and  $Q_b$  units will be sold in the British market for  $P_b$ .

This will not equate the economic importance of the marginal units in each market, however. The direct economic importance of the marginal unit in the American market is its final use value, as indicated by  $P_a$ . The indirect importance to the American economy of the marginal unit sold in the British market is its ability to finance imports, as indicated by  $MR_b$ . Now,  $P_a$  and  $MR_b$  cannot possibly be equal when there is dumping because  $P_a$  will always be greater than  $MR_a$  and the latter figure is deliberately equated to  $MR_b$ . For these reasons  $P_a$  will exceed  $MR_b$  when there is dumping. This is an a priori mark of over-exportation.

The well-being of the national economy will best be served

if output is reallocated towards greater direct home use so that  $MR_b$  is raised and  $P_a$  is lowered until both become equal. This condition is also illustrated in Figure 9 when  $Q_{a'}$  units are sold in the American market at  $P_{a'}$  and  $Q_{b'}$  units are sold in the British market at  $P_{b'}$ . The total output is supposed equal in both cases (that is,  $Q_{a'}Q_{b'}$  is constructed equal to  $Q_aQ_b$ ). There are a number of ways in which this superior outcome could be brought about by means of government action.

The analysis contained in this section can be partially summarized by contrasting three different formulas for allocating output between the home and foreign markets. The rule for simple private allocation is to equate  $P_d$  with  $P_f$ ; for dumping, the rule is to equate  $MR_d$  with  $MR_f$ ; and, to maximize the efficiency of the home economy, the rule is to equate  $P_d$  with  $MR_f$ . The subscripts d and f refer to domestic and foreign respectively.

#### Exploitation of Monopsony Power

(Several countries purchase very large fractions of the total supply of certain goods entering international trade.) For example, to mention only a few instances, the United States takes over half the coffee and silk, and the United Kingdom absorbs over half the meat exports of the world. (In such cases the centralized buying by the importing country can influence price by accelerating or retarding its rate of purchase. What is the best volume of imports for the purchasing economy?)

Let us suppose a country that imports its entire consumption of some good and purchases a sufficiently large percentage of the world supply to be confronted by a positively sloping supply schedule. Consequently, a large volume of imports can only be obtained by paying a higher price than would be necessary if a smaller volume were bought. Perhaps the quantity-to-price relationship is that tabulated below in columns 1 and 2 (Table 21).

TABLE 21

MARGINAL COST OF IMPORTS AS DERIVED FROM A SUPPLY SCHEDULE

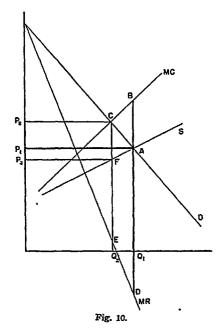
	1		2	T	3 OTAL		4		5	6 MARGINAL
	QUANTITY PR (IMPORT SCHEDUI		PRICE EDULE)	$(1 \times 2)$		Δ IN TC (FROM 3)		$\Delta$ in q (from 2)		COSTS (45)
1 r	nillior	tons	\$ 8	\$ 8 r	nıllions				4774	
2	u	u	9	18	46	\$10 п	nillions	l r	nillion	\$10
3	"	**	10	30	"	12	"	1	"	12
4	"	44	11	44	•	14	a	1	ıt	14
5	**	"	12	60	"	16	et	1	"	16

It will be noted that the marginal cost of importing an additional unit will be considerably in excess of its actual purchase price. The explanation of this is that a higher price must be paid to extract more units from other markets, and this higher price must be paid, in the absence of discrimination, on all imported units. For example, the price must be raised from \$10.00 to \$11.00 if the quantity of imports is to be increased from three to four million tons. The total cost of this extra million tons is far more than 11 million dollars because an extra dollar has now to be paid on the three million units which were previously importable at \$10.00 each; the incremental cost of one million tons is therefore 14 million dollars, or a marginal cost of about \$14.00 a ton. This excess of marginal cost over price is extremely significant for the importing country.

Figure 10 illustrates the case of a country that imports its entire consumption of some good. The domestic-demand schedule is represented by the D-curve, import supply by the S-curve, the marginal cost of imports to domestic purchasers by the MC-curve, and the marginal receipts of foreign sellers by the MR-curve. The equilibrium price  $(P_1)$  and quantity

 $(Q_1)$  reached in the absence of government interference are those which equate demand with supply in the market.

This situation is not optimum from the viewpoint of the monopsonistic economy. Imports give rise to claims by for-



eigners upon the national economy, which must eventually be honored by sending exports abroad amounting to a like value. The rate at which the importation of a specific commodity augments these foreign claims is represented by MC in Figure 10. Thus, importing the  $Q_1th$  unit increases the indebtedness of the national economy by  $BQ_1$  dollars. Over long periods of time this must be paid back in the form of extra exports—that

is by domestic consumers sacrificing use value of the same value.

However, although the  $Q_1th$  unit increases the indebtedness of the economy by  $BQ_1$ , its consumer use value is only  $AQ_1$ . There is a net economic loss of AB on the marginal unit imported. Such a net loss can only be avoided if total imports are restricted to  $Q_2$  because then the "last" unit has a consumer use value of  $CQ_2$ , and as marginal cost is  $CQ_2$ , this is also the extra amount of consumer use value foreigners can now extract from the national economy in exchange. The total gain from limiting imports in this manner is represented by the area ABC.

How is the government of the importing nation to establish an equality between the demand price and marginal cost of the "last" imported unit? One possibility would be to impose an import duty of  $P_2P_3$  a unit and so limit the incoming volume to  $Q_2$  units. This would be a stable situation. Domestic consumers would buy  $Q_2$  units at  $P_2$  and foreign suppliers would sell  $Q_2$  units at a price of  $P_3$ . The difference between total consumer outlay and total supplier receipts is the customs' collections of the taxing government.

The use of import duties to restrict imports to  $Q_2$  from  $Q_1$  units continues to provide a net gain of ABC for the national economy. An examination of the special interests of the domestic consumers and the taxing government will reveal this to be true. We do not consider the interests of the foreign suppliers because this analysis thus far has been nationalistic. The domestic consumers suffer a loss in consumers' surplus of ADEC. Against this must be set the customs' collections of the government amounting to BDEC. This is a valid offset since every dollar of government revenue gained in this way will entail either tax relief or state services for residents in the importing country. The net social surplus—that is, the algebraic sum of consumers' surplus and customs' collections—is therefore ABC.

Unfortunately, the gain of the importing nation that ex-

ploits its monopsonistic power is less than the loss of the exporting nation or nations whose supplies are discriminated against. This can be readily perceived if we will now recognize that the special interests of foreigners are equally relevant, and so include the loss of suppliers' surplus in our reckoning. The restriction of imports by means of a tariff will then give the following account of gains and losses:

Customs' collections Consumers' surplus Suppliers' surplus	BDEC -ADEC -ABCF	(loss)
Net effect	-ACF	(loss)

In short, there is an international loss.

∠ Possession of monopsony power is not always a valid argument for import tariffs. The supplying countries, which are injured disproportionately, are apt to retaliate. Widespread retaliation will give rise to an over-all international loss because all countries will then be forced to practice an undesirable degree of self-sufficiency.)

#### Concluding Note

(Modern monopoly theory makes extensive use of the concepts of marginal receipts and marginal costs. These concepts facilitate an examination of a number of theoretical problems that long defied satisfactory analysis. It is notable that in all the three instances here considered, monopoly or monopsony power provides immediate benefits for the interest that exploits it. However, it is equally remarkable that in all such cases the gain is disproportionately small in terms of the losses suffered by others. Here is a case where selfish greed is usually antisocial in its general effects and invites common disaster through retaliation.)

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## Chapter 11

# Mercantilist and Classical Theories of International

HE new geographical discoveries which ushered in the sixteenth century expanded the foreign trade of western Europe. It was inevitable that merchants, statesmen, and even philosophers in the affected countries should turn their attention to the behavior of money, prices, and markets. tain of these men attempted to deduce general principles from their various observations, and a majority came to the conclusion that an export trade balance would make a state powerful and prosperous. These mercantilist views obtained general acceptance in intellectual circles until almost the close of the eighteenth century, but by then maturer reflection had occasioned misgivings and doubts. Finally, Adam Smith administered the coup de grâce to mercantilism. The resultant void did not long remain empty, for the beginning of the nineteenth century witnessed the evolution of what was later to be known as the classical theory of international trade. . The new theory tended to be deductive and theoretical, especially at the outset, and emphasized real forces, such as labor and commodities, to the consequent neglect of money and prices. These principles were elaborated during the remainder of the nineteenth century and have only recently been superseded. The doctrines of the mercantilist and classical writers bulk so large in the development of economic thought that despite a diminished usefulness historical interest in them grows with the passage of time.

#### Mercantilist Views

A majority of the political economists who wrote during the seventeenth and early eighteenth centuries emphasized the desirability of exports overbalancing imports, and to a man they recommended various state regulations to accomplish this objective. These men are known as mercantilists, or occasionally in the case of the earliest writers as bullionists.

The English, unlike the Spanish, possessed no gold or silver mines in the New World. The only ways they could obtain specie, bullion, or treasure were by the acquisition of new possessions containing mines, pirating on the high seas, or by foreign trade. The second method was characteristically Elizabethan. But of course it was the last possibility which gave the most promise of continued success in the long run.

Pamphlet writers, men of public affairs, and others having leisure and inclination to concern themselves with the subject, expressed the rather obvious idea that gold and silver would be introduced into the kingdom if goods of greater value were sold abroad than were bought from foreigners. The following comments of Sir Francis Bacon, written in 1616, are so typical that a single example will suffice.

"This realm is much enriched, of late years, by the trade of merchandise which the English drive in foreign parts; and, if it be wisely managed, it must very much increase the wealth thereof; care being taken, that the exportation exceed in value the importation; for then the balance of trade must of necessity be returned in coin or bullion."

These ideas are all too prevalent even today.

No one will quarrel with the mercantilist assertion that an export balance will introduce gold and silver into the nation. At that period the balance of payments consisted almost entirely of trade items. Loans were very infrequent and were mostly limited to borrowings by princes from rich goldsmiths

<sup>&</sup>lt;sup>1</sup> The Works of Francis Bacon, Edited by Basil Montagu, Vol. 2, p. 385. Philadelphia: 1852.

and silversmiths. Consequently, redemption and interest payments hardly entered into international accounts. The only invisible items of any consequence were shipping service, Catholic remittances to Rome, and later, rent payments from Ireland to absentee landlords. The real issue between the mercantilists and latter-day economists concerns the desirability of a gold and silver inflow.

Modern economists consider it axiomatic that money is primarily a means to an end. Men labor after money, not for itself, but in order to command goods in consumption. Also, being a highly convenient medium of exchange, money facilitates specialization of production, and hence increases economic efficiency. However, a great many mercantilists felt that the mere existence of gold and silver within a country, even though it were withheld in private hoards or in the state treasury, contributed to the well-being of the people and state. What is the explanation of this attitude?

A number of royal advisors were probably obsessed with the importance of keeping a war chest. The financing of the recurrent national and dynastic struggles was always a problem. Tax systems were very rudimentary, and customs were still the principal source of revenue apart from the royal estates. The armies and navies were paid partly from the monarch's own pocket or out of individual subscriptions. Most of the ships which routed the Spanish Armada were owned by private associations of gentlemen and adventurers. Charles I created a storm of resentment when he imposed a ship-money tax on the larger towns in order to strengthen the Royal Navy. Success in war frequently went to the prince who could afford the largest army of mercenaries and the biggest navy. Responsible statesmen knew that money, which in those times meant gold and silver, was rightly described as the sincus of war. Consequently, the military power and diplomatic influence of a state rested in no small measure on the size of its war chest and the amount of gold and silver circulating within its jurisdiction.

There was probably also a moral basis for some of the lauding of exports over imports. The foreign traders in the cities tended to be puritanical and to eulogize thrift and frugality. Accumulation of gold and silver by the nation as a whole was considered a virtue. Moreover, many of the imports into England, such as wines, brandies, spices, jewelry, and exotic animals, were luxuries intended for the courtiers and gentry, and were of a character offensive to God-fearing people.

A very few of the best mercantilistic thinkers viewed money receipts as a stimulus to the national economy. The centuries in which they lived were marked by a growth of trade and population. This, plus an increasing division of labor, meant that more money was needed to facilitate trade and to prevent the depressing effect of falling prices. There was a money famine which, in the days when negotiable credit instruments and paper money were largely unknown, could only be alleviated by an influx of the precious metals. It is noteworthy that these old ideas have recently been revived and widely acclaimed by professional economists.

However, the simplest, least flattering, and most probable explanation of why the majority of mercantilists thought as they did is that they were generalizing from their individual experience and interests. If a man with a great deal of money lives more comfortably than others, why should this not be true of a nation? If sensible men save against a rainy day, why should this not be a wise policy for a whole people? If money brings power to a family, why not to a state? Moreover, it should never be forgotten that the mercantilists often viewed public affairs with a class bias. Many of them were wealthy tradespeople who wanted to sell easily and for a good price at home and abroad. Accordingly, they welcomed any action by the state that would protect them from foreign competition or would develop markets overseas. Mercantilists were almost always employers and usually thought that low wages would promote the national interest by encouraging exports. It is but human to assume that policies favorable to

one's own welfare will also be beneficial to all, and to suppose that one is under a social obligation to urge such policies on the public at large.

The mercantilists are important because they influenced the thinking of later economists in one way or another. A few of their observations were later synthesized by Hume. Mercantilist doctrines became the target of Adam Smith's barbed criticisms; and their theories stand as a contrasting background behind the principles of the classical writers who followed.

Mercantilist doctrines are fascinating to those who are interested in the workings of the human mind. These doctrines have a universal appeal. Their essential assertions conform to everyday experience and to what passes for common sense. They have a self-evident quality; indeed, their truth is as obvious as the flatness of the world. Ordinary men in every time and clime will think mercantilist thoughts quite readily and without the effort of deliberate reasoning. Mercantilism is a tenacious superstition, but eventually economic science may succeed in routing it once and for all.

# David Hume and the International Distribution of Specie and Bullion

In his *Political Discourses* published in 1752, David Hume combined a number of earlier theories to prove the utter futility of all state schemes to accumulate gold and silver within a nation. None of the elements of Hume's tour de force was novel, but he united these elements more effectively than any previous writer. And his reputation in other fields ensured widespread notice of his economic theories.

Hume began with the quantity theory of money which had been evolved by John Locke almost fifty years before and which asserts that prices vary directly with the amount of money and inversely with the supply of goods. Hume was also familiar with the concept of specie or gold points acting as checks on fluctuations in money-exchange rates, a principle that had already been enunciated by Samuel Clement at the end of the seventeenth century. An earlier writer named Dudley North had previously pointed out that bullion tended to be minted when money is scarce and that coins are usually melted down when prices are low. Hume was able to synthesize these related notions into a description of the now familiar price-specie-flow mechanism of adjustment. The following passages are deservedly famous:

"... Suppose that all the money of Great Britain were multiplied fivefold in a night ... Must not [the price of] all labour and commodities rise to such an exorbitant height, that no neighbouring nations could afford to buy from us; while their commodities, on the other hand, become comparatively so cheap, that, in spite of all the laws which could be formed, they would be run in upon us, and our money flow out; till we fall to a level with foreigners, and lose that great superiority of riches, which had laid us under such disadvantages?

"Now, it is evident, that these same causes, which would correct these exorbitant inequalities, were they to happen miraculously, must prevent their happening in the common course of nature, and must forever, in all neighbouring nations, preserve money nearly proportional to the art and industry of each nation." (pp. 325, 326)

The political significance of such doctrines was very great. The raison d'être of most mercantilistic restrictions on foreign trade was an augmentation of the nation's gold and silver holdings. If, as Hume wrote, the magnitude of these accumulations was determined under natural law, why not permit overseas commerce to proceed untrammeled?

# Adam Smith's Arguments for Freer Trade

The Wealth of Nations, to use its short title, was published in 1776. Only a few of its many chapters relate directly to foreign trade, and yet this single book did more than any other to introduce free trade into western Europe. Adam Smith was primarily a philosophic observer of man's struggles to win

a livelihood from his surroundings. He was interested in commercial operations because they were a means to that end. He engaged in economic theorizing only if he could shortly derive some policy prescription. It is unlikely, had he been a mathematically inclined economist of the modern type, that he would have been able to count so many leading statesmen among his avid readers.

Division of labor and its attendant advantages are the dominant theme in Smith's scheme of principles. He was greatly impressed by the extra output a community can make if each household specializes in production. Concentration on one line of endeavor permits the individual to increase his knowledge and skill and efficiency. He can then afford to augment his output by employing specially adapted tools. Enforced self-sufficiency, by way of contrast, condemns families to a miserable scratching of the soil and the lowest subsistence which is endurable.

These ideas were not entirely novel even in Smith's day. His real contribution lay in attacking the numerous guild and government restrictions on trade. He hated such obstructions because they prevented a more complete division of labor. After all, productive specialization is only possible if one can exchange surplus output for the things one has not made oneself; otherwise, everybody must squander his energies in undertaking a great variety of projects, and suffer accordingly. Smith held that these were universal truths and as applicable to foreign as to domestic trade. Consequently, he looked upon customs duties as contrary to the social interest, and was inclined to regard the smuggler as a public benefactor. Smith had a vitriolic pen, and he was at his best when ridiculing mercantilistic theories or chastising the greed of monopolizing businessmen. These verbal attacks were to take effect in the decades to come.

The following quotations exemplify the way in which Smith sought to convince his readers that every nation should produce those things for which it was best suited.

"It is the maxim of every prudent master of a family. never to attempt to make at home what it will cost him more to make than to buy. The tailor does not attempt to make his own shoes, but buys them of the shoemaker. The shoemaker does not attempt to make his own clothes, but employs a tailor. . . ."

"What is prudence in the conduct of every private family. can scarce be folly in that of a great nation. If a foreign country can supply us with a commodity cheaper than we ourselves can make it, better buy it of them with some part of the produce of our own industry, employed in a way in which we have some advantage. . . ."

". . . By means of glasses, hotbeds, and hotwalls, very good grapes can be raised in Scotland, and very good wine too can be made of them at about thirty times the expense for which at least equally good can be brought from foreign countries. Would it be a reasonable law to prohibit the importation of all foreign wines, merely to encourage the making of claret and burgundy in Scotland?" (pp. 424, 425)

Smith's wrath was readily aroused by the doctrine that there should be a bilateral balance of trade between each pair of nations. On this score he could become quite rude, as is evidenced by the following excerpts:

"The Portuguese, it is said, indeed, are better customers for our manufacturers than the French, and [their imports] should therefore be encouraged in preference to them. As they give us their custom, it is pretended, we should give them ours. The sneaking arts of underlying tradesmen are thus erected into political maxims for the conduct of a great empire; for it is the most underlying tradesmen only who make it a rule to employ chiefly their own customers."

"... That it was the spirit of monopoly which originally both invented and propagated this doctrine, cannot be doubted; and they who first taught it were by no means such fools as they who believed it. In every country it always is and must be the interest of the great body of people to buy whatever they want of those who sell it cheapest. The proposition is so very manifest, that it seems ridiculous to take any pains to prove it; nor could it ever have been called in question, had not the interested sophistry of merchants and manufacturers confounded the common sense of mankind." (pp. 460, 461)

Smith was sufficiently ahead of a majority of his contemporaries to deny that an export balance was necessarily a "favorable" balance of trade. Instead, he emphasized what he termed the balance of annual produce and consumption which gauges capital accumulation and additions to a nation's capacity to make goods. The following paragraph possesses both economic and historic interest.

"The balance of produce and consumption may be constantly in favor of a nation, though what is called the balance of trade is generally against it. A nation may import to a greater value than it exports for half a century or more. perhaps, together; the gold and silver which comes into it during all this time may be all immediately sent out of it: its circulating coin may gradually decay, different sorts of paper money being substituted in its place, and even the debts too which it contracts in the principal nations with whom it deals, may be gradually increasing; and yet its real wealth, the exchangeable value of the annual produce of its lands and labour, may, during the same period, have been increasing in a much greater proportion. The state of our North American colonies, and of the trade which they carried on with Great Britain, before the commencement of the present disturbances, may serve as proof that this is by no means an impossible supposition." (pp. 464, 465)

In later years Smith was to become a rallying point for those business interests in Britain and western Europe who desired an extension of free trade. The merits of his book have invested it with tremendous influence ever since its publication. The primary importance of book and author, at least as far as the field of international economics is concerned, lies in the demonstrated power of their enlightened propaganda.

# David Ricardo and the Principle of Comparative Advantage

David Ricardo's Principles of Political Economy and Taxation was first published in 1817. It immediately commanded attention because its author's reputation had already been established by earlier pamphlets and essays, financial success on the Stock Exchange, and possibly by his membership in Parliament. This book is a thorough, theoretical treatment of the whole subject of domestic value and distribution. Only Chapter 7, "On Foreign Trade," is of immediate concern to us.

Ricardo's major contribution to the theory of international trade was an idea later to be dignified in text books as the principle of comparative cost. He was anxious to show that a nation might properly import goods that it could itself make with a lower expenditure of labor as long as its efficiency in making other exportable goods was relatively greater still. In order to make this point Ricardo supposed that Portugal sent wine to England in exchange for cloth, and that the labor cost of production of these goods in the two countries was as follows:

#### Comparison of Labor Costs

	Portugal	England		
Wine (x bl)	80 men a year	120 men a year		
Cloth (y yd)	90 " " "	100 " " "		
(x bl of wine	trade evenly for a	vd of cloth)		

Evidently Portugal can make both commodities more economically in terms of labor expenditure than can England. Notwithstanding, Portugal should specialize in wine and import cloth. She can then obtain cloth for only 80 man-years of labor by exporting wine for imports of cloth. This is a saving of 10 man-years because it would cost her 90 man-years to produce the cloth domestically. This pattern of foreign trade, by economizing on the use of Portuguese labor, should permit a greater total production and consumption in Portugal.

England is likewise benefited by this trade. Through inter-

national exchange she is able to obtain wine in return for 100 man-years work in making cloth. Otherwise, if this wine were made in England, it would require the work of 20 extra men a year.

The resultant wastes of self-sufficiency were described by Ricardo when he wrote:

"If Portugal had no commercial connection with other countries, instead of employing a great part of her capital and industry in the production of wines, with which she purchases for her own use the cloth and hardware of other countries, she would be obliged to devote a part of that capital to the manufacture of those commodities, which she would thus obtain probably inferior in quality as well as quantity." (p. 82)

Trade based on comparative cost makes for a wiser use of capital and labor.

The important principle here is that a nation should not produce all the goods it can make better but only those it can make best. Or in the case of a singularly inefficient country, it should not cease all production simply because its labor costs are worse in every trade; it should rather drop only those lines in which its performance is worst. In the above example the Portuguese costs were only 66 per cent of the English in the case of wine, but 90 per cent in the case of cloth; and so Portugal specialized in the commodity which she could make with the greatest relative efficiency. And England concentrated on the good which she could produce with the least relative inefficiency.

What would transpire, however, if by some strange coincidence, one nation might be able to make all goods with only 80 per cent of the labor expenditure required in some other country? There would then be no trade between these two territories because the first country would not enjoy a comparative cost advantage in any single line. The skeptical reader is invited to work out an arithmetical example for himself.

Ricardo did not possess a complete and integrated theory of international trade. He did not attempt to explain what determines the amount of wine that is traded for some quantity of cloth, but simply made an assumption to help him explain comparative cost. Ricardo was also unconcerned about the broader equilibriums which take place when two national economies adjust to one another through foreign trade.

The English classical school of which Ricardo was one of the original and outstanding members possessed several common characteristics. One of them was a labor theory of domestic value. The classical economists united in their assertion that the price relationships of goods within a country were proportional to the relative quantities of labor needed to make them. However, they held that this theory was inapplicable in the case of international price relations because labor and capital were immobile among different countries. At this point, when they passed from the domestic to the international sphere, their cost approach to price determination proved inadequate, and they began to labor under increasing difficulties. However, the classical school, by phrasing their analysis in real terms and abstracting prices, could often relate their analyses more directly to problems of economic wellbeing. This was at once their weakness and strength.

## John Stuart Mill and the Equation of International Demand

John Stuart Mill, writing thirty-odd years after Ricardo, also addressed himself to the question of how international values, as contrasted with domestic values, are determined. Two chapters of his *Principles of Political Economy*, published in 1848, explain how the barter terms of trade between two countries are established by the Equation of International Demand, which is sometimes called the principle of reciprocal demand. Thus, it will be seen that Mill sought to fill one of the most serious gaps in Ricardo's doctrines.

The barter terms of trade refer to the amount of an imported good that trades evenly for some amount of an exported good.

In other words if the aggregate value of each of the two goods is equal to the other, the barter terms of trade are simply the reciprocal of the price relation. For obviously, where a and b refer to goods,

if 
$$P_a \times Q_a = P_b \times Q_b$$
  
then  $\frac{Q_a}{Q_b} = \frac{P_b}{P_a}$ .

A country's barter terms of trade are said to be improved if the price received for each unit of export becomes higher relative to the price paid for each unit of import. This means that a larger quantity of imports is received for the same quantity of exports, or perhaps that the same imports can be had for fewer exports.

Mill commenced his investigation by assuming a situation in which England exported broadcloth to Germany in exchange for linen. His example ran in terms of comparative advantage—that is, the differential outputs obtained from an equivalent input of labor, instead of in terms of comparative cost, as couched by Ricardo before him. Specifically, Mill assumed the following outputs from a given expenditure of labor:

	Germany	England
Linen	20 yd	15 yd
Broadcloth		10 yd

He then asked himself what would be the outside limits to the barter terms of trade if England specialized in broadcloth and . Germany exploited her comparative advantage in linen. The answer is that no nation will accept less favorable terms of trade than the output relationship that would prevail at home if both commodities were produced domestically. If England were an isolated economy, one yard of broadcloth would exchange within the country for 1.5 yards of linen; accordingly. England will engage in international trade whenever she can obtain equal or more favorable terms. For similar reasons Germany will be willing to give up two yards of linen, or less

if possible, for a yard of broadcloth. The linen to broadcloth terms of trade must lie somewhere between 2 to 1 and 1.5 to 1 if there is to be any international trade.

Mill asserted that the actual terms of trade will be governed by the necessity of having the total value of the exchanged cloth and linen equal to each other. His analysis did not run in money prices but rather in linen prices of cloth. Now, should the linen price of cloth fall, the English will offer less cloth per yard of linen, and the Germans will offer more linen per yard of cloth. However, there will only be equilibrium when the ratio of the linen yardage offered to the supply of cloth yardage is equal to the linen price of cloth. In semi-algebraic form this would require that

 $\frac{\text{linen offers}}{\text{cloth offers}}$  = price of cloth expressed in linen

cloth offers = price of linen expressed in cloth

If this condition is fulfilled the total value of the goods traded will be equal whether calculated, in lieu of money, in terms either of linen or cloth. Mill believed that there would be only one linen price of cloth that would equate the linen value of the cloth offerings and the linen yardage supplied.

· Mill also wanted to know what determined the share each country received of the total potential gains from trade. For example, if the equilibrium value of 10 yards of cloth is 17 yards of linen, England gains two yards, and Germany saves three yards by engaging in trade. At a higher linen price for cloth Germany would save more, and England would gain less. This development might take place if the demand for cloth increased or the need for linen fell.

Mill was also concerned with what he termed the extensibility of foreign demand. For example, what will happen if technical improvements in Germany, which are not possible in England, enable the same quantity of German labor to produce 30 yards of linen as previously could make only 20

yards? If 10 yards of cloth previously exchanged for 17 yards of linen, one might suppose that they will now exchange for half as much more, or 25 1/2 yards of linen. But this will depend upon the new English demand for linen at its cheapened price. If the extensibility is unity, the proportionate increase in the quantity of linen bought by England will be equal to the proportionate reduction in the price of linen defined in terms of cloth. The final equilibrium trade terms will then in fact be 25 1/2 yards of linen to 10 yards of cloth, and England will share the benefits of the new techniques equally with Germany. However, if the extensibility of English demand is more than unity, so that the reduced cost of linen results in the English offering more cloth than before, then the final terms of trade will be less than 25 1/2 yards of linen to 10 of cloth; and although both countries will be better off than before, the Germans will benefit most because they can now get a larger amount of cloth for the same labor expenditure in exported linen. Finally, if the extensibility of English demand is less than unity, the equilibrium trade terms will be more than 251. to 10, and although the English benefit by more than the improvement in German linen manufacture, the Germans must make a greater labor expenditure in linen if they are to enjoy cloth imports. It is noteworthy that Mill's extensibility is perfectly analogous to Marshall's elasticity except that in the former instance price is expressed in commodity units and in the latter case in money.

The importance which Mill attributed to the degree and extensibility of international demands is indicated in the following passage:

"The only general law, then, which can be laid down is this. The values at which a country exchanges its produce with foreign countries depend . . . on the amount and extensibility of their demand for its commodities, compared with its demand for theirs. . . The more the foreign demand for its commodities exceeds its demands for foreign commodities, . . . the more favorable to it will be the

terms of interchange: that is, the more it will obtain of foreign commodities in return for a given quantity of its own." (p. 603)

Mill also took cognizance of the fact that some countries, having great difficulty in diverting resources from domestic to export trade, will probably obtain better terms when an increased foreign demand leads them to augment their exports. However, this fleeting reference to supply determinants is incidental to his theory as a whole; it is only mentioned, in his own words, "for the sake of scientific correctness," and it "does not seem to make any very material difference in the practical result."

Mill added very greatly, despite the primitive methods he had to employ, to the rather rudimentary ideas of Ricardo. His long pages of involved English would today be translated into a simple diagram containing two offer curves—the offers of cloth for linen by England and of linen for cloth by Germany. He abstracted money from his analysis and hence tended to neglect the many problems of financial equilibrium and price relationships which are an essential part of international trade theory.

#### Nassau Senior and International Wage Comparisons

An important link between two highly significant variables was established by Nassau Senior when he wrote On the Cost of Obtaining Money in 1830. One of the matters he discussed was the relationship between the wage levels in different countries, and in considering this matter, he made the assumptions common to the classical school of his day.

Senior clearly sensed that though labor might be immobile among nations, its productivity and wages are interrelated through the common prices of internationally traded goods. The labor force in each country is in effect competing indirectly with the labor force in every other nation with which trade is carried on. This follows from the fact that a nation will not produce a good, ignoring obstructions to trade, unless the comparative efficiency of its own as against foreign labor outweighs

the wage-level relationship between the two countries. Thus, if Britain and India exchange goods, and a Briton is eight times more productive at some of these trades than a Hindu, the wages of the Hindu cannot be more than one eighth as large. The labor-productivity ratio must be commensurate with the wage level ratio.

Senior was also interested in international price comparisons of goods not entering into world trade. He noted that the mobility of labor within a country compelled producers to pay the same wages in domestic industry as are paid in the export trades. His final conclusion was that prices of domestic and untraded goods would be low (as compared with abroad) if labor productivity in these trades, relative to the nation's export industries, was high (again as compared with abroad). However, these goods might yet fail to be exported because of freight costs or import duties.

## The Reformulated Classical Theory of International Trade

The balance of the nineteenth century brought many additions and refinements to adorn the earliest ideas of Ricardo and Mill. (Cairnes, Nicholson, and Bastable helped in the work of reformulation. Marshall, and recently Taussig, attempted more drastic restatements. Today there is less unanimity of treatment and greater variation in complexity than existed almost a hundred years ago. However, the classical theory of international trade, as reformulated by Taussig and others in the twentieth century, possesses a basic framework which can be presented quite succinctly.)

It will save time if we enumerate the major assumptions and simplifications at the outset. ((1) Labor and all other productive factors are mobile within a country and immobile among nations. (2) Domestic price relationships are based on the cost of the labor embodied in a unit of each community. (3) Competition within each country prevents all save necessary profits. (4) Domestic commodity and factor prices are a function of the money supply. (5) Increased supplies

of a commodity at any given time can always be produced at the same unit cost as before. (6) There are no cost obstructions to the transfer of goods among countries. (7) The balance of payments consists only of trade items. (8) Countries are on an automatic gold standard. The sixth and seventh assumptions are mere simplifications and could be dispensed with if necessary, but the last cannot be relaxed without distorting the framework out of recognition.)

Certain theorems can now be deduced from a comparison of two countries.

First, Country X will rely entirely on imports of good A if the price charged by producers of A in X is higher than that charged by producers of A in Y. Conversely, X will export if  $P_x < P_y$ . This follows from supposition No. 6.

Second, the price charged for A in X is equal to the per-unit costs of producers of A in X. Similarly  $P_v = C_v$ . This follows from supposition No. 3.

Third, the per-unit costs of producing good A in X are based on the wage paid each worker in X, divided by the productivity of each worker in X. This might be expressed as  $C_x = W_x/\phi_x$ . An adapted expression,  $C_y = W_y/\phi_y$ , will be valid for Y. This is based on supposition No. 2. Some classical writers have asserted that per-unit costs are not necessarily equal to wage expense per unit of output, but need only be in some fixed proportion. In this case the formula would be rewritten as

$$C = f \frac{\overline{W}}{\phi}$$

It makes little difference to the subsequent argument which position is taken. Both suppositions are unrealistic.

Fourth, if good A is exported from X to Y, then

$$\frac{\overline{W}_x}{\phi_x} = C_x = P_x < P_y = C_y = \frac{\overline{W}_y}{\phi_y}$$

This follows from the three preceding theorems and assumption No. 2.

Fifth, if X has an export balance with Y, the quantity of

money in X will be increasing while it will be decreasing in Y. This follows from suppositions Nos. 7 and 8.

Sixth, an increasing quantity of money in X will raise wage rates, per-unit costs, and commodity prices in that country. Converse developments will occur in Y. This follows from supposition No. 4.

Seventh, higher prices in X and lower ones in Y will result in X exporting a smaller variety of goods to Y, and a reduced volume of those commodities which are still exportable. In this way equilibrium will be restored because the net receipts of X will decline.

Eighth, a country with an export balance, and which is receiving money, is commanding less favorable terms of trade than it could. It could exact more imports per unit of exports or pay fewer goods for imports.

Ninth, countries with the most productive labor can support the highest wage levels. Provided that conditions are in equilibrium, high wages evidence high productivity. They are a sign of competitive strength.

Various implications of this theoretical scheme may become more obvious if we study the answers the scheme provides to three important questions.

(How do we know what goods will be traded? A country will export those goods that she can produce with comparatively lower real costs, or which is the same thing, with absolutely lower money costs.) The case considered immediately above was one where Country X had a lower money cost in the production of good A than did Country Y. However, these lower production costs are attributable to the fact that the X labor employed in making A is abnormally productive.

The average productivity of labor in X as compared with labor in Y is shown by the relationship of the wage levels in the two countries. Labor is twice as productive in X if we assume wages there are double those in Y. Therefore, if X is to have lower money costs of production for A, the efficiency of its labor employed in A must, other things equal, be above

average for X, or more than twice as productive as Y labor making A. Alternatively, other things equal, Y labor employed in making A must be even less productive than usual. In either event the fact that X has lower money costs in making A reflects the fact that the quantity of labor required to make A in X is not merely less than that needed in Y, but that this disparity is wider than normal. This is equivalent to saying that X has comparatively lower real costs than Y in the making of A.

The fundamental identity of comparatively lower real costs and absolutely lower money costs would be apparent if one were considering a case of domestic rather than foreign trade. Then the mobility of labor would ensure a uniform wage rate. A producer could only have lower money costs than his rivals if it took his laborers fewer man-hours to produce a unit of output than it took his rivals' workers

How is equilibrium in international payments restored? (A country that possesses an export balance will receive gold, and this will expand the domestic money supply. Wages, unit costs, and commodity prices will rise in accordance with the quantity theory of money. Consequently, assuming the general demand for exports is elastic, national credits will fall, and debits will rise. Opposite events will be taking place in the country that previously had a related import balance.)

How are the terms of trade determined? It is still essentially true, to quote Bastable's paraphrase of Mill, that

("The ratio of exchange, in the case of commodities which are the subject of international trade, depends on the comparative intensity of demand on each side, always, of course, operating within the limits set by comparative cost." (p. 27))

However, this does not mean that the costs of producing a commodity are entirely without influence on the terms of trade. (Put very baldly, the price of a specific good is directly determined by its costs of production, but the general level of money

costs within a country is indirectly based on the comparative intensity of foreign demand.) Let us consider the immediate supply side first. Assuming competition and constant cost. the per-unit cost of production will always be the same, and will equal the supply price; and if the supply schedule is a horizontal line, unit-production costs must then equal the equilibrium price in the market. Accordingly, the prices of exports, and consequently part of the barter terms of trade. are based directly on costs of production. Here we can shift our attention to the indirect influence of foreign demand. (The general level of money costs (the prices of labor, materials, and so on) is dependent upon the workings of the quantity principle of money. A country that can attract and hold a great deal of money will have high factor prices. The ability of a country to maintain a large money stock is partly due to its economic efficiency)-that is, the productivity of its labor-but it is also due to the extent to which other countries want its goods. A strong foreign demand means large sales abroad: this volume of exports brings money into the country, and this in turn raises costs, and hence prices, until equilibrium is established.

(It is important to note that the nations that benefit most from international trade are those that can attract and hold the largest relative stock of money. This gives them higher costs and prices, and consequently improved barter terms of trade, but their initial ability to secure an export balance and gain money depends upon superior efficiency. The productivity of their labor must more than offset their higher wage rates. Superior labor productivity may be due to human excellence, wise and stable government, efficient equipment, or a rich endowment of natural resources.)

As a summary we might ask and answer these three questions in brief form.

- Q. How do we know what goods will be traded?
- A. In accordance with the principle of comparative (real) cost.

- Q. How is equilibrium in international payments restored?
- A. Through the price-money flow mechanism.
- Q. How are the terms of trade determined?
- A. According to the equation of international demand.

These three constituent explanations are usually associated with the names of Ricardo, Hume, and Mill respectively. However, these ideas are most useful when integrated into a monetary medium, as they have been by Taussig.

#### Criticisms of the Classical Theories

It is simple enough to discredit the classical theories, although the logic itself is impeccable, because some of the vital assumptions detailed at the beginning of the preceding section are wholly unrealistic.

It is untrue that there is complete mobility of productive factors within a country and immobility among nations. Cairnes pointed this out when he emphasized the existence of noncompeting labor groups within a national economy. There is no such clear-cut distinction as the early classical writers chose to suppose. This assumption had unhealthy consequences because it led to one theory for domestic values and to another for international values. Some of the earlier writers, who were handicapped by their failure to use quantitative methods, had difficulty in uniting both sides of the market into a common scheme of price determination. Accordingly, their theory of domestic values stressed cost and supply aspects unduly, whereas their theory of international values overemphasized the demand side. Actually it would have been better for economic theory as a whole to have evolved the same techniques to handle both kinds of markets. This was subsequently accomplished by Ohlin and others. Today it is generally realized that international trade is simply a special case of interregional trade.

The labor theory of value is undoubtedly the weakest part of the classical treatment of international trade. (It remains indefensible despite many amendments and elaborations because it would be valid only if there were no scarce natural resources earning rents, if different grades of labor could be reduced to a common denominator because wages for all kinds of work within a country were in proportion to productivity, and if all three factors of production were always locked up in fixed proportions in every undertaking. Actually, any one of these three requirements is seldom ever met; and it simply is not true that prices of domestic goods are equal, or even in proportion, to the total amount of labor embodied in them.)

It is no longer correct to say that the money supplies of different countries rise and fall in obedience to the dictates of an automatic gold standard. (The price-money flow mechanism seldom operates at the present time. Today governments adopt definite fiscal policies, and seek to control these matters through their central banks.)

The main body of value and monetary theory has come a long way since Mill. The subsequent ideas of Marshall, Keynes, and Mrs. Robinson, to mention only a few, are all applicable to foreign trade. A worth-while theory of international economics must eventually incorporate these improvements. (That the classical theories are now obsolete for use in some situations is no disparagement of their progenitors. One expects improvement with the passage of time, and modern writers have had the benefit of their predecessors' ideas. Moreover, the classical theories still throw a revealing light on a number of problems. An economics practitioner needs to have them in his tool kit even though he will not use them for every job at hand.)

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## Chapter 12

# Foreign Trade and the ational Income

realization of equilibrium in a nation's balance of payments primarily through price changes. Either the country having a favorable balance experiences rising domestic prices or its currency appreciates on foreign exchange markets. Moreover, heretofore we have been tacitly assuming that resources are always employed at about the same level from year to year. We have certainly avoided discussion of the possible unemployment of men, capital, or natural resources. We must now take cognizance of the facts that overcapacity and underemployment often exist, and we must examine what influence foreign trade may have on this situation. (Most modern analyses of this problem run in terms of income rather than price relationships.) We shall find that these new ideas enrich rather than contradict our earlier theories.

## Theory of the "Multiplier"

In each national economy, money is constantly passing from hand to hand. The wage earner soon spends his weekly pay check, perhaps at the corner store or in returning some loan; the storekeeper and the bank will soon spend the money again, perhaps in replacing inventories or discounting new notes; and so it goes on, around and around.

The rate at which money circulates within the national economy may rise or fall. It will rise if in some way there are injections of new money into the system, but the rate will decrease if certain leakages develop which permit money to seep out of the national economy.

We shall ignore the specific ways in which these injections and leakages occur until we have completed a preliminary survey of the *multiplier* in action.

What will be the increase in monetary circulation if \$100 of new money is injected into the national economy a single time and the leakage is one third, or 33½ per cent, in each period after the money is first spent? In the first period the entire \$100 is spent, but there is a leakage of \$33.33 before it is spent again. This leaves only \$66.67 additional money to be spent in the second period; and one third of this (\$22.22) leaks out before it is spent again. This leaves only \$44.45 to be spent in the third period, and so forth over a considerable time. The middle section of the following table traces the diminishing effect of the original injection from period to period as more and more of it leaks away.

TABLE 22
MONETARY CIRCULATION

	SINGLE INJECTION		SUCCESSIVE INJECTIONS	
PERIOD	AMOUNT SPENT	LEAKAGE	AMOUNT SPENT	LEAKAGE
1	\$100.00	\$33 33	\$100.00	\$33.33
2	66.67	22.22	166.67	55 55
3	44.45	14.82	211.12	70 37
	29.63	9.88	240.75	80.25
4 5	19 75	6 58	260 50	86 83
6	13.17	4.37	273 67	91.20
ž	8.80	2.93	282.47	94.13
8	5.87	1.96	288.34	96 09
ÿ	3.91	1.30	292.25	97 39
10	2.61	.87	294 86	98 26
11	1.74	.58	296.60	98 84
12	1.16	.35	297.76	99.19
13	.81	.27	298.57	99,46
14	.54	.18	299.11	99,64
15	.36	.12	299.47	99,76
00			300.00	100,00

The ultimate effect would be very different though if another \$100 was injected every period, forever and ever. In

the second period the amount spent would be the new injection of \$100 plus \$66.67 left over from the injection in the first period, or a total of \$166.67 additional money. In the third period the amount spent would be the new injection of \$100, plus \$66.67 left over from the new injection in the second period, plus \$44.45 left over from the injection of the first period, or a total of \$211.12. The total leakage will also continue to increase if there are successive injections of \$100 in each period. The leakage in the first period is only \$33.33. In the second period the leakage is \$33.33 from the most recent injection plus \$22.22 from the injection in the former period, making a total of \$55.55. In the third period there is a leakage of \$33.33 from the third injection, \$22.22 from the second injection, and \$14.82 from the first injection. This is shown in the right section of Table 22.

(The cumulative leakage, resulting from a succession of periodic injections, increases at a decreasing rate.) After 12 periods it has already risen to over \$99, and is hence almost completely offsetting the new injection of \$100 which takes place in each period. Eventually, (if the experiment went on for an infinitely long time, the total leakage would exactly offset the new injection of the same period. By that time the total rise in money circulation, resulting from successive injections of \$100, would be \$300 per period. This is three times as great as the periodic injections.)

(In other words the multiplier (M) is three.) This is necessarily the reciprocal of the one-third leakage that occurred in each period. If the leakage had been one fourth, the multiplier would have been four, and successive injections of \$100 would finally cause a sustained rise in monetary circulation of \$400. We might paraphrase this by saying that the multiplier is the reciprocal of the leakage, the multiplicand is the successive injection, and the product is the rise in monetary income. The general formula in quasi-algebraic form is:

Rise in money income = Periodic injection (in S)

Lenkage in each period (as a decimal)

The economic significance of a rise in monetary income will be discussed later. At this point we shall discuss concrete injections and leakages that are related to international trade. This calls for study of several distinct cases.

## Autonomous Rise in Exports

Let us suppose that there is an autonomous increase in the exports of a single country (A) to the rest of the world (Z). An autonomous change in the trade balance is one which is independent of changes in income in the home economy. Thus, foreign countries may start buying more from us because their lands have been devastated by war, because they have come to prefer the kind of goods we make, or because freight costs or tariff duties have suddenly fallen. The initial result, whatever the cause, is that the national economy of A receives new money via its exporters, from the outside world. This is the injection.

## Case 1-Induced domestic imports.

The exporters of A, who first receive this new money from outside, spend it for materials and their own enjoyment. The persons from whom they buy will in turn spend the money. Most of these assorted purchases will be domestic. However, a few will be made abroad. In other words, (the increased income in A, resulting from the autonomous increase in exports from A, will subsequently induce a few additional imports into A.) (An induced change is related to changes in income in the home economy.) The outlay for these induced imports is at least one important leakage.

Let us suppose that the propensity of disbursers in A is to spend one fifth of any and all income increases on imports and that the autonomous increase in exports is \$1,000,000 a month. Then the multiplier is five, and the monthly rise in monetary circulation in A is \$5,000,000.

The formula is

$$I_A = \frac{T_A}{t_A} = \frac{1,000,000}{0.20} = 5,000,000$$
 (in dollars)

where I is resultant change in money income, T is the autonomous change in export value, t are the induced imports expressed as a decimal, and the subscript designates the country concerned.

## Case 2—Case 1 plus induced fall in purchases by foreigners.

Let us suppose the same autonomous increase in A's exports of \$1,000,000 as before. Again we shall suppose that the induced imports of A are always 0.2 of any increase in monetary income. However, we should realize that (if the change in trade balance is truly autonomous, the people in the rest of the world have suffered a dejection of money:) their incomes have been reduced, initially at least, by \$1,000,000 a month. Obviously this will have repercussions; for one thing, they will buy fewer goods from A as their incomes fall. Perhaps this repercussion in Z is customarily 0.05 of any change in A's income.

(In this case the national economy of A is subjected to two leakages. There are the induced imports into A, which are 20 per cent of any income increase in A. Then there is the repercussion of reduced exports from A to Z, corresponding to five per cent of any change in A's income. These two leakages can be added together and treated as one.)

We know that final equilibrium will come when the total leakage eventually reaches \$1,000,000 and so exactly offsets the periodic injection. Four fifths of the total leakage of 25 per cent is due to the induced rise in imports into A, and so this must eventually be \$800,000. One fifth of the total leakage is due to the generated fall in imports into Z, which will be \$200,000. The new balance of trade for A in any one month will show a rise in gross credits of \$800,000 (the \$1,000,000 autonomous increase in exports minus the induced fall in exports of \$200,000), also a rise in gross debits of \$800,000 (the induced imports into A), and so the international accounts remain in balance.

In any one period the sum of the two leakages is 25 per cent

or 0.25. The multiplier is then 1/0.25 or 4. The permanent rise in the money incomes of people in A will be \$4,000,000 each month. This will be evident from the formula

$$I_A = \frac{T_A}{t_A + {}^A r_z} = \frac{1,000,000}{0.20 + 0.05}$$

where  ${}^{4}r_{z}$  is the trade repercussion because people in Z import less (or more) as money incomes in A rise (or fall).

Case 3-Case 2 plus induced domestic saving.

A third common leakage is induced saving at home. (Most persons save and hoard a greater number of dollars as their money income increases.) For the sake of simplicity we shall

e that this propensity to withdraw more dollars from circulation as incomes rise is always in the proportion of \$15 to \$100. In other words, induced saving in A ( $s_A$ ) is 0.15. We shall continue to suppose that induced imports into A ( $t_A$ ) are 0.20 and that the trade repercussion in Z ( $^{A}\tau_{Z}$ ) is 0.05. These three leakages can be combined into the following formula

$$I_A = \frac{T_A}{t_A + {}^A r_z + s_A} = \frac{1,000,000}{0.20 + 0.05 + 0.15}$$

The multiplier in this case is 1/0.40, which is 2.5. Therefore the autonomous change in exports from A of \$1,000,000 a month will generate a rise in money incomes in A of \$2,500,000, which is less than the estimates made under former assumptions of fewer leakages.

The principal interest in this case, though, is in the breakdown of the dollar value of the combined leakage. We know that the total leakage must exactly offset the autonomous change in exports; consequently, the total leakage is also \$1,000,000 a month. The values of all leakages are expressed as decimals of autonomous income changes in A. The total leakage is 0.40 when expressed as a decimal. Three eighths of this is due to induced domestic saving. Consequently, the dollar value of the induced domestic saving must

be \$375,000 a month. Similar dollar calculations can be made for the other two leakages, and the results are shown in the following table.

TABLE 23		
BREAKDOWN OF	LEAVAGES	

TTPE	AS DECIMAL OF INCOME CHANGE IN A	AS PERCENTAGE OF TOTAL LEARAGE	DOLLAR VALUE
S <sub>4</sub> ,	15	37.5	\$75,000
ta	20	50.0	500,000
$t_A$	05	12.5	125,000
2	.40	100.0	1,000,000

The final adjustments in A's monthly balance of payments are significant. The sudden autonomous shift in trade which gave A extra credits of \$1,000,000 a month must somehow be offset. Induced domestic imports of \$500,000 are half the answer. Foreigners suffering from reduced means cut their purchases by \$125,000, which leaves \$375,000 still unaccounted for. Unless the rest of the world is paying A in gold, the only remaining possibility, in the present case, is that the discrepancy is made good by a loan from A to Z. Under the circumstances it would seem that the induced domestic savings have become an international capital loan.

## Explanation of r-the "trade repercussion."

'In cases 2 and 3 we have assumed that the autonomous change in trade  $(T_A)$  had subsequent trade reactions in both countries. In A we talked about the induced rise in imports  $(t_A)$  and gave this a value of 0.15. In Z, however, we did not talk about an induced fall in imports that was based on Z incomes  $(t_Z)$  but rather referred to trade repercussions in Z based on A incomes  $(^4T_Z)$  which were given the value of 0.05.

Actually, there need be no distinction between  $t_z$  and  ${}^4\tau_z$  when there is no induced saving in either country. However,

far more complicated reactions are set up when income changes induce different rates of saving or dis-saving in both countries concerned. If we first trace the reactions of an autonomous trade shift through A, the formula for the trade repercussions in Z ( $^4r_z$ ) then is

$$t_Z \frac{s_A}{s_Z}$$

where  $t_z$  is the induced change in imports in Z,  $s_z$  is the induced change in saving in Z, and both are expressed in terms of Z incomes.

What is the meaning of this formula for  ${}^4r_z$ ? Perhaps the value of  $t_z$  is 0.03. This means that the people in Z reduce their imports from A by \$3 for every \$100 decline in their incomes. However, where there is the complication of induced saving in both countries, the change in Z incomes cannot be calculated directly from the amount of the autonomous shift in trade  $(T_A)$ . The fact that people in A are now saving more, lessens the increase in their induced imports, and hence cuts down on this subsidiary aid to Z income. And the fact that people in Z are now saving less tends to mitigate their reduction in imports from A. Thus, observing all the results of the autonomous trade shift from the viewpoint of A, the trade repercussion in Z will be high if induced saving in A is great and induced dis-saving in Z is small. On the other hand, if induced saving and dis-saving are equal in both countries, their effects cancel out. Both these important truths are indicated by the formula.

It is now a simple matter to calculate from our assumed values for the other variables what the rate of induced saving or dis-saving in Z must be. Already we have supposed that  ${}^4r_z$  is 0.05,  $s_A$  is 0.15, and  $t_Z$  is 0.03. Therefore  $s_Z$  (the rate of induced changes in Z with changes in Z incomes) must be 0.09.

## Case 4-Income effects abroad with all four leakages.

Finally, let us neglect the income effects in A of an autonomous trade shift in its favor, and instead concentrate on what

happens to the level of incomes in Z. What is the value of  $M_{Z}$ , the multiplier in Z? Will the fall in Z incomes be equal but opposite to the rise in A incomes?

We proceed by using a formula which is analogous to those already employed, namely

$$M_z = \frac{1}{t_z + s_z + z_A}$$

where

$${}^{z}r_{A}=t_{A}\frac{s_{z}}{s_{A}}$$

Therefore, substituting values, we have

$$M_Z = \frac{1}{0.03 + 0.09 + 0.12} = 4.16$$

Moreover, the fall in income in  $Z(I_z)$  will be  $M_zT_z$  or

$$4.16 \times -1,000,000 = -4,166,666$$
 (in dollars)

In this case the outcome is negative because the autonomous increase in Z's trade  $(T_z)$  is negative. It is noteworthy that (the leakages now operate to slow up the accumulating fall in money incomes. The leakages, in other words, are always drags.)

Finally, as a check on our various formulations, let us calculate the dollar value of the constituent leakages and compare them with Case 3. We have already learned from Case 2 that \$500,000 is caused by people in A buying more from Z as their incomes rise. People in Z decrease their imports from A by three hundredths of \$4,166,666, or \$125,000. Induced saving in Z, being nine hundredths of the change in Z incomes, is minus \$375,000. However, we have not assumed any autonomous saving or dis-saving in Z, and, therefore, this dis-saving presumably takes the form of "borrowing from the outside," which in this case must mean from A. These calculations exactly confirm the conclusions reached in Case 3.

#### Summary and conclusions

Certain important rules can now be given for the general case where there are trade and saving reactions in both countries. The change in income (I) brought about by an autonomous change in trade (T) is always T times the multiplier. This multiplier (M) is the reciprocal of all the combined leakages.

The following two formulas are the multipliers for a single country (A) and for the rest of the world (Z).

$$M_A = \frac{1}{t_A + s_A + t_Z \frac{s_A}{s_Z}}$$

$$M_Z = \frac{1}{t_Z + s_Z + t_A \frac{s_Z}{s_A}}$$

These formulas reveal certain noteworthy facts:

1. (The foreign-trade multiplier of a country will be large if (a) it has a low propensity to save, (b) it has a low propensity to import, (c) other countries have a high propensity to save, and (d) other countries have a low propensity to import.)

2. The ratio of the multiplier in one country to the multiplier for the rest of the world is in the same proportion as the ratio of the propensity to save in the rest of the world to the propensity to save in the domestic country.) In other words,  $M_A: M_Z = s_Z: s_A$ . (The propensities to import, although affecting the absolute magnitude of the final multiplier, do not influence the relative size of the multipliers.)

3. The multiplier in one country is not affected by a change in the propensities to save and import abroad as long as these latter changes are proportionate to each other.)

#### Autonomous Credit Creation

The money incomes of a nation may alter because of a monetary change originating in the home economy. The banks are perhaps expanding credit, or the government may

be printing money. Perhaps the national administration is attempting to secure full employment by a policy of public works financed from new credit. *Pump-priming* programs of this type have many reactions in the field of international trade and finance.

## Case 5-Expanding domestic credit

(Rising money incomes in A will lead to increased purchases of imports from the rest of the world. Foreigners who receive new money for their exports to A will begin to experience a multiplier effect of their own) The rise in money incomes abroad is slowed, however, by persons in Z purchasing more from A, but this reinforces the multiplier effect in A, so that more is bought from Z, and so on back and forth. In this case a high propensity to import on the part of foreigners  $(t_Z)$  increases the multiplier of the credit creating country  $(M_A)$  by recouping some of the money leaking from its own nationals' propensities to import  $(t_A)$ . In this case the gravest threat to  $M_A$  is from saying rather than from trading propensities.

Let us suppose that A is expanding credit by one billion dollars every three months, but that the rest of the world (Z) is neither expanding nor contracting credit. We shall assume the following values for the four relevant propensities:

	A	Z
t	0.30	0.10
8	0.15	0.05

The total leakage for the A economy in this case is

Machiup, Fritz, International Trade and the National Income Multiplier. Philadelphia: The Blakiston Co. 1943

$$\frac{s_A + t_A + t_Z \frac{s_A}{s_Z}}{1 + \frac{t_Z}{s_Z}} = \frac{0.15 + 0.30 + 0.10 \left(\frac{0.15}{0.05}\right)}{1 + \frac{0.10}{0.05}} = \frac{0.75}{3} = 0.25$$

and the national multiplier  $(M_A)$ , being the reciprocal of this, is four. Hence the quarterly credit expansion of one billion dollars should maintain domestic money incomes four billion dollars per time period over their original value.

The validity of the above-stated leakage formula cannot be satisfactorily demonstrated without resort to unduly extensive mathematics; therefore, the formula will have to be taken on trust. The numerator of the present leakage formula is identical with the entire leakage formula applicable to autonomous trade shifts. In the case of autonomous credit creation, however, there is an explicit denominator which will normally be greater than one. This means that (the domestic-credit multiplier will usually be higher than the foreign-trade multiplier considered in the preceding section. By how many times it is higher will depend upon  $t_z/s_z$ . If this is two, the domestic-credit multiplier will be three times as great as the foreign-trade multiplier.)

It is interesting to contrast the propensities that make for a high multiplier in the two cases of autonomous trade shifts and autonomous credit creation. In both instances serious leaks develop from domestic propensities to save and trade. However, these can in part be recouped by developments abroad. In the case of autonomous domestic export there will be a partial recovery of leakages if the foreign propensity to save is high, although the foreign propensity to import is a leak in its own right. However, in the case of autonomous credit creation at home, leakages can be partly recouped if foreign propensities to import are high, but here foreign propensities to save are an additional leak. This contrast in the aid rendered the multiplier by  $t_z$  and  $s_z$  has important bearings on public policy.

## Case 6-Foreign expansion of credit

(The countries that surround a nation that is inflating its currency will naturally experience repercussions. They will be exporting more, and so will be increasing their money incomes. The commencing multiplier effect will only be slowed by induced imports and savings in these surrounding countries.)

What exactly happens in Z when A begins expanding credit by one billion dollars a quarter? First we must estimate the increase in the export business of Z to A. This depends on the magnitude of the final-income increase in A and the propensity of A to add to gross imports. In symbols the foreign-induced exports from Z can be expressed, where  $C_A$  is the autonomous credit creation in A, as

This is the multiplicand to be used in estimating the final change in Z incomes.

The multiplier in  $Z(M_z)$ , being based on its own nationals' propensities to trade and save, is simply

$$\frac{1}{t_z + s_z} = \frac{1}{0.10 + 0.05} = 6.6$$

The dollar rise in money incomes in the world outside  $(I_2)$  will therefore be

$$\frac{C_A M_A t_A}{t_z + s_z} = \frac{1,000,000,000 \times 0.40 \times 0.30}{0.10 + 0.05} = \frac{120,000,000}{0.15}$$
= 800 million dollars.

In this particular case  $M_Z$  is higher than  $M_A$  for several reasons. Much of the income rise in A flows over into Z because of the high propensity to import into A from Z. However, it only flows back from Z to A at a much slower rate because  $t_Z$  is only one third as large as  $t_A$ . Moreover, both the leakages, trading and saving, are lower in Z than in A. No general conclusions about the relative magnitudes of the two multipliers should be derived from this particular illustration, how-

ever, for the values of all the propensities were assumed arbitrarily.

#### Effect on international trade and finance

The autonomous credit creation in A and the accompanying income increase in surrounding countries (Z) have various consequences for international trade and finance. Knowing the relevant propensities we can easily calculate the increase in imports and loans of each area.

TABLE 24
IMPORTS AND LOANS\*
(in millions of dollars)

CHANGE IN	A	z
Imports (gross) Exports (gross)	-1,200 + 800	+1,200 ~ 800
Trade shift (net)	- 400 + 400	+ 400 - 400
Balance of payments (net)	0	0

The magnitude and direction of the foreign investment is deduced from our calculation of the trade shift and the necessity for all credits and debits to balance.

It should not be inferred that the country that commences to create credit always concludes by financing a newly developed import surplus from abroad. Some other choice of propensities might have yielded an opposite outcome.

## The Relationship of Autonomous Credits and Exports

In the preceding sections we have outlined the theory of the multiplier under two conditions. The first condition was when the injection of new money arose from an autonomous export shift—that is, when exports increase or imports decrease as a cause rather than as an effect of income changes at home. The second case of autonomous credit creation was when the monetary supply was expanded at home as a cause rather than an effect of changes in the trade balance. An autonomous

change is an original and causal force that sets off a chain of induced reactions. The question which we must now consider is whether these two sets of multiplier theories are affected by the kind of monetary systems employed in the various national economies. Will there be a net injection of money into a country that experiences autonomous exports if the nations concerned are on an inconvertible paper standard? Can there be an autonomous credit expansion in a country that is on a full gold standard? In order for both kinds of autonomous changes to be possible, is it necessary that the national economies regard both gold and bank credits or inconvertible paper as moneu?

## A special kind of gold standard

Let us suppose that A and B have monetary systems of such a nature that the quantity of money in each country never changes except by the amount of gold that enters or leaves the national economy. This situation would arise if the money supply consisted of gold coinage or gold certificates exclusively. It would also occur if bank notes and bank deposits had to have 100-per-cent gold backing except for a constant fiduciary issue. Let us further suppose that gold is the only means of settlement between different national economies.

Under these assumptions (an export shift must bring more gold into the economy that is selling on balance. There is clearly an injection of new money arising from these autonomous exports because the new gold is defined as money. This very simple sort of arrangement is an approximate description of what used to happen centuries ago in Europe.)

However, there cannot be an autonomous credit creation under this sort of gold standard. The domestic money supply cannot be increased unless money is injected from outside the economy through an export shift or the loan of gold. Our very assumptions preclude the possibility that the banking system could take the initiative in increasing the quantity of bank notes or bank deposits.

What of the case where, apart from a constant fiduciary issue, bank liabilities alter as some constant multiple of the system's gains and losses of gold through international transactions? In this instance the multiplier effect of an autonomous export shift would be very much increased because it would engender a domestic credit expansion in addition to the other repercussions already treated. However, there could be no autonomous-credit creation independent of changes in the system's gold stocks. This is tantamount to saying that in a country that can only obtain gold through exports or borrowing and that has no gold extraction of its own, there can be no autonomous credit expansion. This was essentially the case envisaged by the classical economists.

# A rigid form of inconvertible paper standard

What special considerations would arise if countries operated on an inconvertible paper standard and gold were not used to settle international liabilities?

It is hardly conceivable that an injection of new money · would occur from an autonomous export shift. Let us suppose that country A develops a favorable balance of payments with Z. There are various ways in which this favorable balance could be financed. People in Z might buy A-money through selling Z-money to people in A. Then the people in Z use this A-money to import goods from A, but the people in A use their Z-money to purchase securities and other assets in Z. Another possibility is that people in A might buy Z-securities offered for sale in A. This means that people in Z would acquire a surplus of A-money to finance the import balance into Z. In either case people in A are denying themselves the goods that are exported and are lending to Z. However, nothing has taken place to change the quantity or velocity of money in A, and so monetary incomes in the exporting country presumably remain unchanged.

A very unlikely case would be that people in Z had large holdings of A-money acquired during some earlier period and subsequently hoarded, which they now release into circulation as they purchase goods in A for shipment to Z. In this special case a favorable balance of payments would involve an injection of new money, and an unfavorable balance would mean that the money of the home economy was disappearing into the hoards of foreigners. However, nationals of one country do not normally acquire large hoards of another economy's money.

If people in Z acquire A-money by borrowing from banks in A, and A's favorable balance of payments is financed in this way, there will be an increase in the money supply of A. However, this monetary injection is not due originally to the favorable balance, but rather to the expansion of bank credit in A resulting from loans to people in Z. This is really a case of autonomous credit creation for a special purpose.

It would seem in fact that a nation having a monetary supply consisting exclusively of inconvertible paper will normally experience injections and dejections of money only when there is autonomous credit expansion or contraction)

## A mixed monetary system

During the recent past most countries have proceeded with hybrid money systems, and they will probably continue to do so in the immediate future. Usually the domestic supply of money is made up of inconvertible paper and bank credit, whereas international payments are handled by gold transfers or through monetary authorities that shift their holdings of foreign and domestic currencies. The crucial question is whether the monetary authorities of the various countries allow these international payments to influence the circulating-money supply of their respective economies. If, as is often the case, the authorities undertake offsetting or sterilizing activities, an autonomous export shift will not result in an increased monetary supply, and the multiplier will have no injection to work upon. On the other hand, if the monetary authorities permit international payments to alter the total of

domestic bank deposits and money in circulation, a favorable trade balance may generate a multiplier effect.

# The Balance of Payments and National Income

It would be useful to be able to develop the general relationship between the balance of payments and national income. This relationship, however, is too complex to warrant full development in this book. For present purposes we may indicate the character of the relationship in broad terms.

The reader may obtain a rough idea of this relationship if he substitutes the expression favorable balance of payments for increase in exports whenever the latter occurs in the text, and unfavorable balance of payments for increase in imports. This approach provides only an approximation of the relation in question because it is not the magnitude of the favorable or unfavorable balance of payments which determines the repercussion upon national income, but this magnitude as it is tempered by the behavior of certain propensities to save and spend. That is the components of the balance of payments. in both the current account and the capital account, involve different sets of propensities. Thus, the propensities to use national income in the case of capital-income recipients differ from the propensities in the case of recipients of income from, let us say, the export trade. The interest-recipients' marginal propensity to consume is likely to be smaller than that of the average-income recipient because interest recipients as a class save a larger proportion of their income than do workers in the export industries. If the recipient of income from exports is regarded, as seems reasonable, as an average-income recipient, we may say that the foreign-interest multiplier will be smaller than the foreign-trade multiplier. The multipliers associated with different types of international capital movements are even more complicated and variable.)

# Some Practical Considerations

The bare idea that an injection of new money into an economy will probably generate a far larger rise in money incomes

is not hard to grasp. The refinements of the various formulas may seem obscure, but they merely adorn the same essential theme. What practical lessons can be learned from the foregoing?

# A comparison of multiplier values

The multiplier effect of an injection of new money, which is always calculated with a given set of propensities, depends upon where this addition is first inserted into the national economy. Successive injections of x million dollars per period will have the least-multiplier effect if the injections result from an autonomous export balance. In this case it is to be hoped that the foreign propensity to save  $(s_r)$  is high, and the foreign propensity to trade  $(t_r)$  is low. The multiplier will be slightly higher in the case of foreign-induced exports—that is, when an autonomous credit creation in another country gives rise to an export balance from the homeland; low domestic propensities to trade and save will help the multiplier in this case. The greatest-multiplier effect will result from an autonomous credit creation, and especially when  $s_r$  is low and  $t_r$  is high.

This order of M-values can easily be checked if the reader will assume a set of propensities, and will work the following review of formulas:

In autonomous export balance

$$M = 1 \div \left[t_D + s_D + t_F \left(\frac{s_D}{s_F}\right)\right]$$

In induced foreign exports

$$M=1\div(t_D+s_D)$$

In autonomous credit creation

$$M = \left(1 + \frac{t_F}{s_F}\right) \div \left[t_D + s_D + t_{F_{\bullet}}\left(\frac{s_D}{s_F}\right)\right]$$

The subscripts D and F refer to domestic and foreign propensities respectively.

These formulas teach us that the size of M is often dependent upon the relative values of the various propensities. Certain propensity ratios are often crucial. Will saving tendencies outstrip trading propensities? Is a nation more inclined to import from the rest of the world than other countries are to import from it? Government policy might well rest on the answers to just such questions.

A small nation will have a high tendency to import, and a large country will have a low importing propensity. For example, Belgium imports a larger percentage of her national income than does the United States. On the other hand, the rest of the world (Z) will buy only a small percentage of any increased purchases from a single country (A) because most of the trade will be among nations within the Z-group. Even large nations such as the United States will have a much higher propensity to import from other nations than the rest of the world will tend to import from the United States. This size disparity between the domestic and foreign propensity to import is still greater in the case of small countries. Another reasonable expectation is that countries enjoying high levels of consumption will have higher import tendencies.

Saving propensities will generally be lower than importing tendencies. This will be true especially of small nations because their trading inclinations are particularly high. Domestic saving propensities usually vary with the real income level. Poor nations having low living standards cannot afford to withhold funds and resources from current consumption. Only the richer nations have high saving propensities, and consequently, it is they that do most of the international lending.

## What is the relevant time period?

The M-values that we have been using are found from formulas of the final or instantaneous type. The values are calculated on the assumption that there will always be an infinitely long time allowed for the ultimate effects of the periodic injections to materialize. However, governments are

not interested in what effects their actions will have a decade later: they may have been voted out of office long before then.

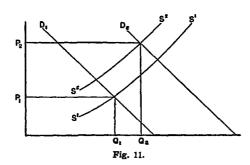
Fortunately <u>most</u> of the income results of successive money injections will take place after a limited number of periods. The total leakage grows at an ever slower rate. Accordingly, it takes only a few periods for the multiplier effect to attain almost its full size. About 90 per cent of the final multiplier value will usually have been generated within ten periods. How long, though, is ten periods in terms of calendar time?

(A single period is the average length of time it takes between receiving income and disbursing it.) A wage earner may spend most of his weekly pay check before next payday. A general store may not replace inventories out of its cash-register receipts for the better part of a month or so. The respending lag may be longer for establishments with costly fixed investments which depreciate slowly. Various attempts to estimate the average lag for the United States set it at about three months. Slightly longer periods have been suggested for other countries. The initial period may be somewhat shorter or longer depending on how the new money is first introduced into the system. (For practical purposes we may suppose that 90 per cent of the final-multiplier value is achieved after ten periods of three months each or after  $2\frac{1}{2}$  years in all)

The calendar duration of a single time period does not otherwise affect government calculations regarding the amount of credit creation needed to generate a prescribed rise in monetary incomes. Let us suppose that an administration's aim is to raise the national income by 10 billion dollars a year. It is estimated that the average period is three months and that the final multiplier is about six. This means a rise in total income of  $2\frac{1}{2}$  billion dollars each quarter, which should require a quarterly injection of 417 million dollars. The annual injection will hence be 1.668 billion dollars, which is one sixth of the desired rise in yearly incomes of 10 billion dollars. The final income increase will be M times the injection irrespective of the time elapsing between successive disbursements.

# Significance in terms of real-income change

(There can be no doubt that persistent injections of new money will eventually raise monetary incomes. How important is this, though, in terms of real income change? No one has yet devised a way to eat or wear money. In the final analysis consumption levels can be improved only if more food, houses, clothes, gadgets, and other consumers' articles are produced. The crucial economic question is whether rising money incomes will cause productive resources to be employed more fully and efficiently.)



In order to give a tentative answer, we might consider the effects of monetary expansion on a single market. Let us suppose that either the government or private business is engaged in large-scale construction programs that are being financed with new bank credits. The steel industry, among others, will immediately increase its sales. Material requirements for construction and an expansion of the money supply will combine to shift the demand curve for steel products upwards and to the right  $(D_2$  in Fig. 11). The result will be both higher steel prices and output, but which is the major effect will depend upon the slope of the supply schedule for steel products. Normally the slope will rise more sharply at higher outputs because various bottlenecks will be encountered, especially in

the short run before there is time to enlarge fixed capacity; also, equipment will be overworked and depreciate at a wasteful rate, poorer ore deposits and coal seams may have to be exploited, and less efficient labor will be hired (S<sub>1</sub> in Fig. 11).

Other more slowly operating forces will be at work on the cost side. Large-scale disbursements of newly created bank credit by government and business will tend to raise the costs of all producers. This money will be respent by the steel industry, and then the money will be respent over and over again until it reaches the general public. All consumer and derived demands will experience a lift. Competition among all producers for all factors of production will bid up wages, rents, and probably interest rates. Eventually higher factor prices and other newly increased charges will raise costs per unit of output. The supply schedule for steel will shift upwards and to the left  $(S_2$  in Fig. 11).

The outcome of all this may be a slight increase over the original output of steel products and a very considerable rise in price. Similar results will accrue in other industries. The economy as a whole will experience an augmentation of output to the extent that it can draw formerly idle resources, into employment or use them all more efficiently. In practice these two potentialities may partly work against each other. (Increasing employment of resources usually involves the use of the less productive units of each class of factor. In good times entrepreneurs may be wasteful, investors may commit resources to ventures that have no real economic worth, and the newly found security of workers may cause them to let up on the job.)

The experience of the United States during World War II confirms the above reasoning. For several years the Federal government alone was spending as much as the entire national income amounted to shortly before the war. This flood of Federal spending swept business log jams aside and caught up all sorts of formerly unemployed resources. At the beginning of this period (1939-1940) there was considerable

overcapacity in many lines and a certain measure of underemployment. Increased government expenditures, which were financed in considerable part from inflationary sources, caused roughly equivalent increases in physical output. However, after a while almost all employable persons had taken a job. The employment of low-grade workers lowered industrial efficiency. The productive slack which previously existed in the system was taken up. After this point increased government disbursements and private respending exerted a greater pull on prices than on output. The usual connection between money circulation and physical output began to slip. The amount of slip would have been measured by the soaring price level had it been allowed to rise freely.

These final developments are not surprising from a theoretical standpoint. After all there are two obvious limits to the output of goods and services. One is productivity per unit of input, and this tends to fall as full employment is reached and units that were previously submarginal are put to work; the other limit consists of the level of employment of natural resources, capital, and people. Eventually limits are reached in every case. Some natural resources will never repay exploitation, and the supramarginal ones can only be worked more intensively with more scarce capital and labor. More roundabout methods of production, which require extra capital investment, may simply be too cumbersome and inefficient. After a certain point is reached, it becomes almost impossible to put more people to work or to force them to labor longer hours. (These limits in turn impose a ceiling on production which cannot be raised by any monetary tricks, and the output limit is always reached sooner in wartime because the ablest workers are in the armed forces.)

However, the situation is somewhat different in peacetime. (The production ceiling is higher because the full labor force is available. Domestic uncertainties may prevent private investment of sufficient proportions to maintain full employment. Productive slacks can again develop in the system.

Under these circumstances the multiplier theory, with its attendant consideration of foreign trade and saving leaks, may have real significance for economic welfare.)

## Income and Price Approaches Compared

Broadly speaking there are two approaches to the economic analysis of international equilibrium. One might be termed the *price approach*; the other, the *income approach*. In most respects the two approaches are supplementary, so that one of them alone will seldom provide a complete understanding of international economics.

## Income and price elasticity of demand

A very simple example of the distinction between these two viewpoints is afforded by the contrast between price elasticity of demand and income elasticity of demand. A price elasticity of 0.5 means that a certain percentage change in a commodity's price, let us say 8 per cent, will cause buyers to vary their purchases by a percentage figure one half as large, or by four per cent. On the other hand, income elasticity of demand treats sales as a function of buyers' income. For example, if this elasticity ratio were 0.5, a 20 per cent increase in consumers' income would cause a 10 per cent increase in the number of units sold. In the case of many commodities, income is a more potent determinant of demand than price; for example, a 10 per cent rise in the incomes of new automobile buyers would probably have a greater effect on automobile production in the United States than would a 10 per cent price cut on all current models.

## Trade equilibrium through income and price adjustment

This distinction between income elasticity and price elasticity is highly relevant to the attainment of international equilibrium. Let us suppose that there is an autonomous increase in exports from E to I. We shall furthermore assume that exchange rates between E and I are kept relatively stable.

The price approach to equilibrium predicts an increased money supply and higher prices in E, whereas prices fall in I owing to a declining money supply. This might be expected to occur if both nations are on the gold standard or are members of the new International Fund. These price changes supposedly cause E to export less and to import more until a new equilibrium has been reached. This is essentially the theory presented in earlier chapters.

However, income changes might also be expected to restore balance. The autonomous increase in exports from E to I should raise incomes in E and lower them in I. So far there is no real disagreement because increased money supply and higher incomes are two facets of the same phenomenon. These income changes will be reinforced by M. People in E, now possessed of higher incomes, will commence purchasing more of everything, including goods from I. People in I, who had been hit financially and forced to retrench, will reduce their standard of living, and incidentally buy less from E. The trade of these two countries will accordingly move into a new state of balance. It is noteworthy that this theoretical adjustment through income change makes no mention of prices. Presumably prices remain constant. In any event the attainment of trade equilibrium is not dependent on new price relationships.

However, there are strong reasons for believing that both developments will occur to hasten the process of adjustment. Rising incomes in E will increase effective demands in that country. It is highly unlikely that there can be a general increase in output without rising costs and prices. Simultaneously, all industries in E cannot secure additional resources without bidding up factor prices to some extent. Prices and costs in I will have to fall for opposite reasons. Consequently, people in E will spend a greater portion of their increased incomes in I than would otherwise have been the case. And people in I will spend an even smaller fraction of their dwindling incomes in E than they would otherwise have done. In

other words, people in E buy more from I, whereas those in I buy less from E because of price and income changes.

(The income and price explanations of international equilibrium are supplementary. Seldom does either tell the whole story. Income theories alone are as incomplete as a bare enunciation of price adjustments.)

## Underemployment vs. Malallocation of Resources

The theories of economists mirror the times in which they live. Writers on international trade who lived a century ago knew only a world in which ignorance of modern technology inevitably kept consumption at low levels. Sheer want forced everyone to work, and all available aids of nature and capital were called in. The possibility of sustained and serious underemployment of productive agents never occurred to these writers, and so their theories implicitly assume full and constant employment of resources. This supposition explains their constant emphasis on price adjustments and proper resource allocation.

(A rising money supply, which is attributable to an export surplus, cannot increase domestic output if all resources are already fully employed. There can then be no connection between changes in money income and real income. Rising prices are the only possible reaction)

(Also, the subject of proper resource allocation must receive emphasis in an economy where all factors are employed at a constant rate. The only ways of raising consumption levels are then either through invention or by transfer of resources from the manufacture of one product to the manufacture of another. The practical problem was to see that each country produced the things it was most suited to make.)

The great depression of the 1930's for the first time raised the spectre of permanent economic stagnation. The level of resource employment ceased to be an assumption and became a problem instead. The presence of idle men and machines rendered it possible that increased effective demand, created by credit expansion and government spending, might induce output and employment rather than merely raise all prices and costs. The conception and popularity of multiplier theories are in large part a depression phenomenon.

These broad developments had their repercussions in the more specialized field of international trade. With over ten million men unemployed in a single country, a great many writers lost interest in the earlier question of resource allocation. What if a change to free trade from protection would rearrange employed factors into a slightly more efficient pattern? Elimination of large-scale unemployment would contribute far more to a nation's standard of living and to its politicians' peace of mind. This will always be the prevailing view when there is serious unemployment.

Henceforth there will always be two basic economic problems in the field of international trade. One concerns the proper allocation of a nation's resources and the other relates to the proper intensity of their employment. (How to achieve these two optima at the same time is the question most practical economists want to answer. Each investigation requires a rather different theoretical apparatus and assumptions. Underemployment cures will usually make use of income and multiplier techniques. Suggestions for the improvement of resource allocations will frequently run in terms of price relationships.) The choice of problem often determines the method. Students of international economics should not permit their major interest in one of these problems and techniques to blind them to the existence of the other.

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# PART III COMMERCIAL POLICY

## Chapter 13

## Trade Control: The Tariff

#### Free Trade and Protection

I MPLICIT in the idea of the advantages of specialization in production is the desirability of having an international environment that is free of restrictions upon the play of specialization. Such an environment is that of world free trade. (International free trade should lead to a distribution of productive resources, which would permit the largest possible output for the trading world as a whole and the highest returns to the producers individually.¹ ) Obstacles that impede the functioning of maximum international specialization of production, therefore, only result in reducing the advantages to be gained from trade. This, briefly, is the basic case for free trade. The argument is founded upon the desirability of maximizing economic welfare.

(Although the advantages of free or freer trade are generally admitted in principle, the policies of governments run counter to the free-trade doctrine at almost every turn.) The world pays little more than lip service to the idea of unobstructed international specialization in production. There are at least two closely related reasons why governments honor free-trade principles more in the breach than in the observance. (First, since national specialization involves building up those indus-

<sup>&</sup>lt;sup>1</sup> International free trade does not necessarily rule out monopoly-like trading practices. For example, it is possible, under free trade, for a seller to charge his foreign clients a price that is lower than the domestic price by an amount up to twice the cost of transport. If the foreigner is favored with a price that is lower by more than twice the cost of transport, it is clear that there is a risk that the foreign buyer may resell the product in the seller's market at less than the domestic price.

tries in which the country has a comparative advantage, the expansion of the country's most effective industries—that is, its export industries—tends to be at the expense of the relatively less effective industries.) The export industries thus tend to withdraw labor and capital from less effective industries, which they do by bidding higher prices for these resources. The owners of fixed plants in the less effective industries thereupon complain about the working of the natural forces of competition, as do the workers in such industries who have special skills. (A second reason, closely related to the first, is that the less effective industries face direct commodity competition when a shift is made to free or freer trade.) Goods of foreign origin can then compete and outdo the less effective domestic industries. (Specialization, in other words, means that some industries are built up while others are being eliminated. Appeals are, therefore, made to governments to postpone the threatened elimination of the least efficient national producers. As these appeals generally take the form of a demonstration that domestic industries have to pay higher wage rates than do foreign firms engaged in the same line of work, workers as well as employers seek relief through government action.) As is so often the case, these individuals are much more aware of their interests as producers than as consumers. The free-trade argument subordinates the producer interest to that of the consumer; it frankly states that if the most effective national industries are to enjoy appropriate export markets, the less effective industries must suffer curtailment, at least in a relative sense. This amounts to saying that in favoring the consumer interest, the free-trade principle favors one group of national producers over another (less efficient) group of national producers.

Governments protect domestic producers in varying degrees against foreign competition by such devices as tariff duties, quotas, mixing restrictions (so much domestic flour per pound of bread, and so on), exchange control schemes, and so on. In the remainder of this chapter we shall be concerned with the first of these, the tariff, or the system of taxing goods that move across national boundaries. The other methods of restricting foreign trade or of directing it into particular channels will be considered in chapters to follow.

In order that the reader may see the tariff problem in proper perspective, it will be helpful to consider the relative importance of imports in the economy of the United States. One way to do this is to relate imports of particular classes of goods to total domestic production of the same commodity classes. This relationship is shown in Table 25, where the value of a number of dutiable imports into the United States in 1937 (a relatively prosperous year) is related to the value of domestic production of the same goods in that year.

TABLE 25

DOMESTIC PRODUCTION, DUTLABLE IMPORTS, AND THE RELATIVE IMPORTANCE OF IMPORTS, 1937 a

COMMODITY GROUPS	VALUE OF DOMESTIC PRODUCTION (IN MILLION DOLLARS)	DUTIABLE IMPORTS INTO THE U. S. (IN MILLION DOLLARS)	IMPORTS AS A PERCENTAGE OF DOMESTIC PRODUCTION
Chemicals, oils, and paints	3,718	83	2.2
Earths, earthenware, and glassware	1,428	37	2.6
Metals and manufactures	22,214	114	0.5
Wood and manufactures	1,146	20	1.7
Sugar, molasses, and manufactures.	1,026	127	12.3
Tobacco and manufactures	1,273	32	2.5
Agricultural products and provisions	8,313	310	30
Spirits, wines, and other beverages.	1,209	75	6.2
Cotton manufactures	1.341	44	3 3
Flax, hemp, jute, and manufactures	91	78	85.6
Wool and manufactures	824	83	1.0
Silk and manufactures	134	9	6.5
Manufactures of rayon and other			
synthetic fibers	274	8	2.7
Paper and books	2,076	15	0.7
Sundries	15,145	169	1.1

<sup>&</sup>lt;sup>a</sup> Sources. Value of domestic production, Census of Manufactures, 1937; value of dutiable imports, Foreign Commerce and Navigation.

This table clearly indicates that most imports into the United States represent only a small fraction of domestic production, but the picture the table gives is only approximate. It does not follow, because imports of, let us say, earths, earthenware, and glassware amounted to but 2.6 per cent of domestic production in 1937, that individual American producers of such goods had nothing about which to worry. This and other commodity groups contain a large number of individual commodities, and the impact of imports upon the particular product of interest to specific American producers undoubtedly varied considerably from case to case. In the second place, it should not be concluded from the facts shown in the table that imports would remain relatively unimportant if the height of import duties were to be materially reduced. The volume of imports often depends on the tariff level, and in many categories of trade, imported merchandise would bulk large under relatively low tariffs.

- Before considering protective tariffs as such, it will be helpful to distinguish in a general way between two broad types of import tariffs. One of these is the revenue tariff; the other is the protective tariff. As their names imply, the former is basically a method used by governments to obtain revenue. Revenue tariffs generally carry low rates of duty, and in particular they are not intended to reduce the level of imports appreciably below what it would be in their absence. Since they are not restrictive by intent, they can at times involve high percentage rates of duty if the commodity in question is available only from a foreign source. The reader can easily think of examples in the United States: diamonds readily come to mind. Speaking more generally, revenue duties may be defined as those which (1) offset domestic excise taxes on goods similar to those imported, (2) are imposed on imported products where there are no comparable domestically produced goods, and (3) are imposed at a uniformly low rate on merchandise of foreign origin.

Protective duties are primarily designed to restrict in vary-

ing degrees the entry of foreign commodities. A completely protective tariff yields no revenue whatsoever. As a rule, however, most protective tariffs are not completely protective, but yield some revenue. In borderline cases it may actually be difficult to classify a particular tariff duty, and recourse will then have to be had to the legislative history of that duty.

Customs duties, whether they be of the protective or revenue variety, are imposed by individual countries on goods entering from the outside. The area entered into, however, is not always what is popularly known as the national domain. To clarify matters, a word may be said about the geography of tariffs—the customs area.

#### The Customs Area

(The political frontiers of a nation are not always conterminous with its customs boundaries. There are often some neighboring islands or dependent territories which may or may not be included within the customs area of the motherland.) Thus, the customs area of the United States includes the territories of Alaska, Hawaii, Puerto Rico, and all her other overseas territories except Guam, Samoa, and the Virgin Islands. Where two countries are joined in a customs union, as is the case in the Kingdom of Belgium and the Grand Duchy of Luxembourg, there is a single customs area for two sovereign states. In many countries there are a few restricted areas set aside as free zones for the convenience of business men and in order to encourage an entrepôt trade. And in the past, certain places, such as the Free Port of Hamburg, prospered by virtue of being excluded from the state customs area.

Free zones serve important needs. A shipment of some special type of tea is possibly due to arrive at the Port of London. The British importer, although relying heavily upon the home market, is also perhaps in the business of selling tea on the continental market. However, for various reasons the British importer may have to repack or reship the tea that is destined for re-export. He might not be able to afford to

engage in this kind of business if he had to pay the British customs duty on the entire shipment he received. Accordingly, certain wharves and warehouses at the Port of London are technically outside the British customs area. In such places merchants engaged in entrepôt trade can break down the incoming cargoes, repack and reship the goods which are to be sent on, and pay duty only on those units actually imported and cleared through the customs. In certain countries trade of this kind is important enough, and the profits of the middlemen so engaged have so contributed to the nations' balance of receipts that the governments concerned have been glad to make special arrangements for free zones.

In other cases, though, the entrepôt trade has been less important or perhaps the establishment of free zones has unduly aided smuggling, so that the national government has instituted a system of export rebates instead. The following hypothetical case illustrates how such a system operates. The tea importer pays the requisite duty on every pound of tea that comes into the customs port and is given a certificate indicating the quantity he has brought in and the sum paid. He is then entitled, should be export the identical or equivalent goods, to a proportionate rebate of the total customs he previously paid. In this way the importer avoids any unwarranted financial burden should he subsequently re-export. Rebate regulations vary from country to country. In some places there is a time limit within which receipt holders must apply for rebates. Occasionally rebates are transferable, in which ease they may be sold to other exporters. This latter possibility may have unexpected consequences, particularly when a single nation imports a given commodity over one frontier and exports the same kind of good over another of its boundaries, or when one grade of a commodity is imported and another grade exported. In both cases the effect of transferable rebates is to lower the effective import duty and partially to subsidize exports.

In practice the administration of a rebate system is often

complex, but then the commercial community is becoming ever more accustomed to complicated government paper work. When the rebate system is liberal—that is, when receipts are transferable and rebates can be claimed for export of more or less equivalent goods, irregularities may result, as already mentioned. But if the system is rigorous—that is, when identical units must be exported by the same person who imported them—a similar effect can often be realized by substituting a system of bonded warehouses for rebates. Imports stored in bonded warehouses pay customs duties only when the goods are released from bond for domestic consumption, but exports from bonded warehouses are like re-exports from a free zone.

In general it is realized that the exigencies of foreign trade dictate the establishment of either a free zone, rebates, or bonded warehouses. Which alternatives happen to be employed is in part determined by the relative importance of the entrepôt trade and the bureaucratic development of the national government in question.

#### Classification of Tariffs

Let us turn now to the classification of tariff duties. Tariff or customs duties may be classified in several ways; as to form, three classes may be distinguished: specific duties, ad valorem duties, and combined specific-ad valorem duties.

Specific duties are levies of so many cents per physical unit (pound, foot, number) of commodity. In contrast ad valorem duties are levies stated in terms of a percentage of the value of the imported commodity. Measured as a percentage of the value of the merchandise, ad valorem duties do not change in relative burden with changes in the price of imported merchandise. Specific duties, however, become more or less burdensome, in the sense indicated, with changes in price. In other words, as prices fluctuate the ad valorem equivalent of specific duties also fluctuates. In periods of depression specific duties thus become more protective, whereas the reverse is true in periods of prosperity. Combined specific-ad valorem duties

simply specify that one or the other, usually whichever involves the lowest charge, is payable at the customs. As an example, raw wool may be dutiable at five cents per pound or 10 per cent of its value, whichever yields the lowest dollar charge.

A further point should be made with respect to ad valorem duties. The basis of valuation for ad valorem duties differs as between countries, some of the differences being purely arbitrary. Three bases of valuation may be noted: First, imports may be valued for customs purposes on the basis of price f.o.b. port of origin in the foreign country, which is the method employed by the United States. Secondly, the ad valorem duty may be applied to the c.i.f. (cost, insurance, and freight) value of the goods—that is, to the f.o.b. value plus insurance and freight—which is the most popular method of valuing imports for customs purposes. Finally, there is the method of assigning arbitrary values to each class of merchandise to which the ad valorem duty is applied. The reader should bear these differences in mind because they become important whenever attempts are made to reform any one country's tariff structure by the use of broad formulas or other general criteria (Chapter 23).

Tariffs may also be classified with respect to application as between countries. Three classes again may be noted: single-column tariffs, double- or multiple-column tariffs, and conventional tariffs.

The single-column tariff is one in which only one tariff duty is established by law for each and every commodity, regardless of the country of origin of the goods. Such a tariff is a single-column tariff by virtue of the fact that a single duty is listed in a column opposite the enumerated tariff-commodity classes. Several Latin American countries have such tariffs. The double- or multiple-column tariff is one in which, for each commodity class, two or more duties are established by law and are applied in accordance with statutorily stipulated criteria.

Spain, Brazil, and some of the British Dominions had such tariffs before World War II. The most common tariff, however. is the so-called conventional tariff. Under such a tariff a basic duty is established by law for each commodity class, but each such duty may be reduced by international agreement. When the reduction is widely generalized—that is, granted to other countries as well as to the signatories of the agreement—the result is virtually a single-column tariff, in the sense that the reduced rate is practically the only effective one. The United States, Sweden, the United Kingdom, and others have this type of tariff. However, when duties reduced by agreement are not widely generalized, double- or multiplecolumn duties result. That is to say, if duties reduced by agreement are generalized only to one or two countries, a double-column tariff emerges, because countries not receiving the reduced duties will have to pay the higher rates. A threecolumn tariff would result if a double-column tariff had already been in existence. The triple-decker tariff is illustrated in some cases of British Empire tariff preference. For example, Australia generally utilizes the following three columns: general, intermediate, and preferential, with the preferential rates applying to British Empire goods, and the general rates to all other countries except those with which special tariff agreements have been signed, in which case the intermediate duties apply. As a rule the intermediate rates are only slightly lower than the general, whereas the preferential duties are often as low as one fifth of the general level.

# Measuring the Height of Tariffs

Public discussion is often concerned with the degree to which one nation restricts imports as compared with another country or another period of time. The layman who follows these political controversies will soon become familiar with the concept of tariff wall, and he may be solemnly informed that this has become higher or possibly lower. Such state-

ments appear to be more precise than they really are. It is impossible to do more than vaguely estimate the severity of tariff restrictions.

(The most crude and invalid measurement is to express the total value of dutiable imports as a percentage of the total value of dutiable and free imports.) In the case of the United States this percentage figure has been falling over the last decades, although tariff rates have generally been increasing. The explanation is that if a majority of rates become prohibitively high, the total value of dutiable imports will become very low because very few units will be imported.

(A more reasonable procedure is to attempt the calculation of some kind of an average tariff rate. Employment of an average is inevitable because the tariff only exists as a collection of dissimilar items and rates. However, a simple average of all these rates would not be satisfactory.) Imports such as meat are usually more important than imports such as salt; moreover, some duties are quite meaningless and appear on the statute book for political reasons only, and even in the face of persistent exports. (Some system of weighting is therefore indicated.)

Tariff index numbers can be constructed according to various principles. One of the most satisfactory methods is as follows. (1) Convert all duties, including specific levies, into relative numbers and then add this to one; for example, an ad valorem rate of 45 per cent would become 1.45. (2) Weight each of these relatives with a value. The best compromise weight, for reasons explained below, is probably each import's value before customs plus the total sum of duty paid. (3) All these relatives, one for each dutiable import, should be added together, and this sum should be added to the total import value of all goods entering on the free list. This grand total becomes a numerator in the ratio discussed below. (4) As a denominator in the forthcoming ratio, the total duty collections should be added to the total value before customs of all imports

whether dutiable or free. (5) The grand total calculated under (3) above should be divided by the grand total obtained under (4) above, and some quotient, perhaps 1.35, may be obtained. This quotient, after having one deducted from it, should be multiplied by 100 and expressed as a percentage. In this case the final answer would be 35 per cent, which is approximately the average obstruction raised against all imports by a nation in the period under consideration.

A few comments on this method may be helpful. First, the above formula averages all duty rates whether they are positive or zero. This is only common sense. A nation might apply very high rates on one or two imports, and permit all other goods to enter free; averaging only the positive rates would stigmatize unfairly the country in question as highly protectionist. Second, the formula suggested above is not influenced by purely nominal duties levied on goods that would never be imported in any case. For all practical purposes United States duties on foreign automobiles are in this latter class. Third, using as a value weight import values before customs plus duty collections is an attempt to overcome the basic weakness of all tariff index numbers. The real burden of tariff rates cannot be accurately measured unless we weight with the imports that would have been brought in had there been no duty. Naturally there is no way of estimating what the total value of each import would be under free trade. We do know, though, that a very serious downward bias is introduced into our measure if we weight with the total value of an import before customs because the higher the duty, the smaller will be the physical quantity imported and possibly the price received by the foreign seller. The method used in the recommended formula overcomes this bias if the domestic demand for the import has an elasticity of unity. This may be approximately true after taking all imports into account. Then the total value of the import before customs plus all duty paid on it will be approximately a constant irrespective of the

tariff rate. Whatever figure this may be under present tariff conditions will then roughly correspond to what it would be if free trade did actually prevail.

One other difficulty remains. No measurement of over-all tariff obstruction will indicate the total degree of import restriction. In later chapters we shall discuss import quotas, discriminatory exchange control, and a number of practices which are collectively termed administrative protection. A nation might levy only moderate duties, and yet exclude most imports by other means. In this case a low tariff wall would not evidence liberal trade policies.

#### Effects of Tariffs on Prices

A tariff is protective only if it reduces the number of units imported. This development is usually associated and sometimes confused with an increase in domestic prices. The domestic prices of goods that move in international trade are affected by a tariff in accordance with the manner in which costs in the protected industries vary with changes in output. If a particular industry's products are limited by freight and convenience of location to their foreign markets, a tariff would naturally be superfluous. Examples of such a case can be found among the long list of "domestic" commodities, such as highways, houses, and restaurant meals.

With respect to international commodities a tariff will have no effect when the equilibrium price in the protected market (taken in isolation) is no higher than the equilibrium price in the other market (also taken in isolation). In this case the commodity would never be imported, and here too a tariff will be superfluous. This condition used to be found in the case of such leading American agricultural products as wheat and cotton, but of late special government legislation has enforced prices substantially different from those that would prevail under unrestricted competition. In manufacturing the case of automobiles still illustrates the point being made.

The effects of protective tariffs on prices under competitive

conditions are most successfully analyzed by means of the diagrammatic method. In the several following paragraphs we shall assume that (1) transport costs are zero (such costs have an incidence similar to a duty) and that (2) increasing cost conditions prevail in both countries being compared. These assumptions simplify the discussion, but the conclusions may readily be adjusted to account for different conditions.

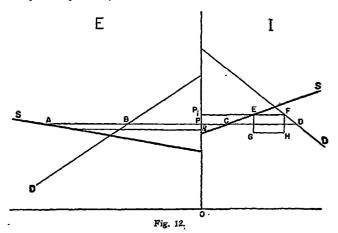


Figure 12 illustrates the conditions of supply and demand in E (an exporting country) and in I (an importing country). The two national markets are shown in a single diagram, price being indicated by a common vertical scale, and quantity being represented from right to left in the case of the exporting nation. (See Figure 3 in Chapter 5 for a prototype of this kind of diagram.) Let us suppose that a duty of \$3.00 a ton is levied by I and that this is represented by a vertical distance equal to  $P_1P_e$ . What will be the effect of this duty?

The tariff might call for an ad valorem rather than a specific duty. In this case the vertical scale would have to be logarithmic and the various schedules drawn accordingly. A given percentage duty would then always be represented by a constant vertical distance.

- A customs duty has at least three different effects which need to be distinguished. (First, is the price incidence, which refers to the extent to which price rises in the importing country and falls in the exporting nation. Second, is the quantity or protective effect, which relates to the decrease in the number of units imported. Third, is the revenue outcome, which has to do with the aggregate customs collections of the taxing government.) Figure 12 illustrates these three effects by contrasting the equilibriums under conditions of free entry and duty penalty.

Price Effect. In Chapter 5 it was shown that when there is free trade between two national markets, a common price will prevail which equates aggregate demand and aggregate supply. This is tantamount to making the obvious statement that the total quantity of exports and imports must be equal. There is another equilibrium condition, however, which must now be made explicit: namely, the price in the import market must be higher than that in the export market by the amount of the duty.

Let us suppose that free trade results in a common price of \$10.00, as represented by PO. Exports (AB) will then equal imports (CD) in quantity. A higher price than this could not have been an equilibrium one because the exportable surplus in E would then have been larger in quantity than the importable deficit in I. However, at a price PO the aggregate supply (PA + PC) will then equal aggregate demand (PB)+PD). The imposition of a specific duty of \$3.00 a ton will require a price rise in I and a price fall in E until these two prices are \$3.00 apart. There is only one combination of prices in E and I that will simultaneously (1) differ by \$3.00 and (2) equate total demand and total supply. In the present case, given the various schedules of supply and demand, this combination of prices must be \$9.00 in E and \$12.00 in I, and these are represented in Figure 12 by OP, and OP, respectively.

Before proceeding further it is necessary to grasp the idea of

a quantity response to price. A given change in price  $(\Delta p)$  may evoke a given change in demand  $(\Delta d)$  or in supply  $(\Delta s)$ . The responsiveness of demand to price may be symbolized by  $\Delta d/\Delta p$  and illustrated by the slope of the relevant demand schedule. This concept is somewhat different from that of price elasticity of demand, which is symbolized by  $P\Delta d/D\Delta p$ , where P and D refer to the mean absolute price and demand respectively.

The price incidence of a specific duty depends upon the joint quantity response to price in E and the joint quantity response to price in I. The joint quantity response to price in E is the sum of the demand response  $(\Delta d_{\epsilon})$  and supply response ( $\triangle s_e$ ) in that country. We shall suppose that this is 120,000 tons in E (per price change of \$1.00). Similarly the joint quantity response in I can be symbolized as  $\triangle d_i +$  $\Delta s_{i}$ , and we shall assume that this is 60,000 tons per dollar change in price. Now, the price incidence of a duty on one market depends upon the share of the other market's joint quantity response in the combined quantity responses of both markets. For example, the joint quantity response of E (120,-000 tons) is two thirds of the combined quantity responses of both markets (180,000 tons); accordingly, the other market, which is I, will bear two thirds of the total duty, or a \$2.00 higher price. The exporting market suffers a price decline of \$1.00.

One normally expects the price incidence to be least upon the exporting nation and most upon the importing country. Why? First, the exporting regions often comprise the rest of the world, and, therefore, being very populous markets, their demand and supply schedules are extremely flat. After all, a given price change will occasion approximately the same per-capita reaction in demand everywhere, but the market that has the largest population will exhibit the greatest absolute change in demand because the per-capita reaction must be multiplied by the number of persons involved. The same is true to a lesser extent upon the supply side. Second, the

importing nation may have no domestic production, in which case it will have no supply schedule of its own, and the joint quantity response in I will then be limited to changes in demand alone.

Quantity Effect. The protective or quantity effect of an import tariff depends upon the quantity response to price of demand and supply in both markets. All four schedules exert an influence; together they tell us what the quantity reduction in either exports or imports will be for every dollar of duty levied.

The reduction in imports will be equal to the joint quantity response in I times the price change in I resulting from the duty. The price change in I per dollar of duty has already been shown to be the joint quantity response in E divided by the joint quantity responses in both markets. Numerically, then, the quantity or protective effect in I per dollar of duty is

$$60,000 \frac{120,000}{120,000 + 60,000}$$
 or 40,000 tons

Inasmuch as the total duty was \$3.00 per unit, this will entail a reduction in imports of 120,000 units. Analogously, the reduction in exports from E per dollar of duty should be

$$120,000 \frac{60,000}{120,000 + 60,000}$$
 or 40,000 tons

This works out to be a total reduction in exports of 120,000 tons. These two reductions are necessarily equal because exports and imports are opposite aspects of the same phenomenon.

The above may be summarized by stating that the reduction in imports or exports per dollar of duty is equal to the

joint response in 
$$E$$
 times joint response in  $I$  joint response in  $E$  plus joint response in  $I$ 

If the total reduction in the quantity of international trade is desired, the results of this ratio must be multiplied by the number of dollars levied as a duty. The above formulation reveals the influence of demand and supply conditions in the exporting country upon the quantity effect of a customs duty. Careless people sometimes write and talk as though the reduction in imports depended almost exclusively upon the elasticity of the domestic demand for the imported good. Such a view is altogether too superficial. The demand response in I might be very low, yet a duty could seriously curtail imports. One possible explanation of this phenomenon is that the falling price in E seriously reduces supply or increases demand in the latter market.

Revenue Effect. The revenue effect of a customs duty is equal to the product of the per-unit duty times the subsequent quantity of imports. In Figure 12 the revenue collections are represented by the rectangle EFGH. Duties are most productive of receipts when the reduction in imports is slight and the quantity responses in the two markets are low. Revenue productivity is not influenced by the particular price incidence of the duty; in other words, tariff collections are not altered because a small or a large part of the duty is shifted on to people in the export or import markets.

There is often some question as to whether an increased duty rate will augment both protection and revenue. The answer depends in part upon what is meant by protection. We have thus far supposed that protection consists of reducing the quantity of imports rather than raising prices at home. In this case, as a duty is slowly raised, there will be increased protection and revenue, until a critical duty rate is attained; at higher duties protection will continue to increase, but customs receipts will begin to decline.

A customs duty that is higher than this critical rate cannot be classified as a revenue tariff. If government receipts were the primary end in view, the duty would presumably be lowered in order to increase revenue. Duties in excess of the critical rate must be considered to be protective rather than revenue tariffs.

#### Summary

Free trade is the ideal situation for achieving the maximum benefits of international specialization in production. As a matter of practical politics, however, the approach should be to strive for freer trade. In this chapter we discussed the geography of tariffs, known as the customs area. The tariff was defined, and a distinction was drawn between revenue and protective tariffs. It was also pointed out that tariffs may be further classified with respect to (1) form and (2) applicability as between countries. With respect to the matter of form, three types of duties were distinguished: specific, ad valorem, and a combination of specific and ad valorem. A threefold division was also made in the case of the applicability of tariffs as between different nations. It was seen that a given nation's tariff may be classified as (1) single-column, (2) double- or multiple-column, or (3) conventional.

Referring to the question of measuring the height of a tariff, it was pointed out that it is not possible to measure this magnitude scientifically, and that in any case the height of a tariff does not measure the degree of import restriction owing to the prevalence of nontariff controls.

The main part of the chapter consisted of the section that analyzed the effects of tariffs on prices. By employing the diagrammatic method, we demonstrated that the normal effect of a tariff is to cause a change in price, but that this price is less than the amount of the duty. How much less depends on the circumstances that determine the extent of the price effects and resulting market changes. We saw that the quantitative responses of demand and supply to given price changes determine the tax incidence and protective and revenue effects.

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## Chapter 14

## Pleas for Protection

ARIFFS and quotas always benefit some special interest and generally inflict injury even upon the home economy. Organized minorities, which desire protection for themselves, must therefore persuade the relatively indifferent majority to accept policies contrary to the latter's true interests. This calls for propaganda of a high order. It explains, perhaps, the great variety and occasional contradictions of the arguments employed, because an attempt must be made to appeal to the prejudices or greed of such groups as industrial workers, farmers, and jingoists. The following chapter presents and evaluates a number of well-known arguments for protection.

## Increased Output

(Almost inevitably the imposition of a tariff or quota is followed by an expansion of output in the protected trades.) At higher prices enterprises become established which otherwise would not be; and existing firms or farms, which supply purely competitive markets, will expand their output until their marginal costs once more are equal to price. Even enterprisers in semimonopolistic lines will probably experience an increased demand which will be exploited in augmented production. Other things equal, this increased economic activity should be reflected in increased consumption.

(The crucial consideration is whether other things are equal. If industry is protected, can it expand without diverting productive factors from agriculture and the service trades;) is it not possible that the increased output of protected lines is

matched by a falling off in production of other goods? Some economists are apt to suppose that the employment level of all productive factors remains fairly constant over time, so that no significant net increase in output is possible. The existence of the business cycle and the nature of war efforts, however, contradict such assertions. The question is, then, whether tariffs or quotas will tend to stimulate business and whether activity is desirable per se.

Let us suppose certain industries receive protection and expand their output of final goods. Let us further suppose that the money value of the end goods produced by the unprotected industries decreases by the same amount. In other words, effective consumer demand remains about the same. Even in this case there would be a temporary expansion in the output of intermediate goods.

This may be shown by a microcosmic illustration. Imagine that the protected industries previously used 700 punches, that the unprotected industries use 700 lathes, that each kind of equipment costs the same to build or buy, and that each has a service life of ten years. Tariffs now increase the final demand of the protected industries by 50 per cent. This means that 350 more punches must be constructed at once plus 70 for normal replacement. This shift in demand perhaps entails a 50 per cent decrease in sales of the unprotected industries' final output. This merely means that 70 lathes will not be needed for replacement as usual. Before protection, 70 lathes and 70 presses were annually required. Now, in one year, there is a demand for 420 punches and zero lathes, which will call for a net increase in the construction of capital goods, and for augmented economic activity.

(Augmented economic activity may in turn stimulate a business boom if the above sequence of events occurs on a large scale.) The enormous expansion in capital-goods construction will increase employment and the money supply because banks will be financing new factories and equipment with loans. This flow of additional funds will eventually pass into con-

sumers' hands and will increase the over-all monetary demand for final goods.

Sudden protection of a substantial segment of the economy may thus provide a temporary shot in the arm. This will be particularly true if (1) the protected industries were previously working at capacity, (2) the average service life of capital goods is long, and (3) capital goods are so specialized or immobile that they cannot be shifted from unprotected to protected industries.

Protection is not, however, a panacea for prosperity. Most of the increase in economic activity occurred because many factories and much equipment had to be built up from nothing, yet there was no net addition to the supply of the sort of things that can be eaten or worn or enjoyed. Financing of the new construction may prove inflationary and hence generate an upswing in business affairs, but the cause and effect must prove transitory. After the new capital has been constructed, it will have merely to be replaced as it wears out, and there will then be no net increase in capital production.

In real terms the long-run result would seem to be negative. Specialized equipment in the unprotected industries is partially wasted, and a great deal of work has to be done to equip new industries. In the end, national consumption may consist of a different assortment of goods, but the total flow of satisfaction after the boom has collapsed will probably be less. The country is no longer producing the goods it can make most easily.

## Mercantilist Fallacies

The three mercantilist arguments presented below all assume that the goal of economic policy should be to increase the money income and holdings of the nation and its citizens. This is a confusion of means and ends. One cannot eat or wear money; money is simply a convenient way of meshing specialized production and generalized consumption. If money had utility of its own, all our economic problems could be solved by inflation.

## Keep the goods and the money too

The most primitive case put forward, but one which is encountered even as between rival cities, is that if we trade only within the group, we end up collectively with both goods and the money, whereas if we buy "outside" we have the goods but not the money. Therefore foreign imports are bad.

If we followed this line of reasoning, exports must be bad too because in this case, apparently, we would have some money but lose the goods. Therefore, this argument really means that both buying and selling outside the group is bad. Carried to its logical conclusion, this must mean that interstate trade is bad, intercounty trade is bad, intercity trade is bad, and so on. If each group suffers from such trade, one wonders why it continues this folly so enthusiastically.

(A factual error in this argument is the assumption that imports involve the loss of money.) Foreigners do not want our money except to make purchases in our country, since this is the only market in which our money has any use. All but a fraction of the money comes back in exchange for exports or investments. Basically, the exchange is of American goods and assets for foreign assets. The crux of the matter is whether the exchange is mutually beneficial. Presumably it is or otherwise it would not take place, especially in the face of the extra transportation and other expenses incident to international trade. Exchange springs from the fact that one group has a great deal of what another group wants, and vice versa. It is as simple as that.

#### Enhance purchasing power at home

Agriculturists who seek protection in order to obtain higher prices often attempt to anesthetize this prospective stinging of other groups by telling them that (prosperous farmers will provide a better market for industry.)

If protected farmers constitute a better market, it is only because they have extracted more money out of the hides of other groups within the economy. These other groups will

now buy fewer industrial products. The cream of the jest, though, is that the industrial community will also pay these higher farm prices and is therefore itself subsidizing the market to which it intends to sell more. For in effect, when one gives a man money to purchase goods from oneself, one is really making him a gift of the goods. Of course industrialists and their workers occasionally reverse the argument and claim higher tariffs on manufactured goods with the plea that this would render the cities better markets for farm products!

Perhaps the long-awaited panacea for universal prosperity is to increase the money income of every group by giving it extra protection, and hence higher prices for its products. However, all-around protection will not increase production. from which all consumption derives. Hence, there can only be a decrease in real purchasing power for the people as a whole. National self-sufficiency will certainly sacrifice part of the output which otherwise would have been available.

## Improve the balance of trade

(The hoary suggestion that we should take imports of less value in order that we might receive larger net payments from abroad is based on the old idea that money hoarding rather than commodity consumption is the true end of economic activity.) This is an especially perverse objective if, as is usually implied, the fall in the value of imports takes the form of a quantity rather than a price decline. Fewer imports coupled with exports on the same scale can only mean fewer goods available for use at home. Under these conditions it would seem meagre compensation indeed to have to accept gold shipments instead of goods.

Realistically though, this is unlikely to happen because most countries no longer make net settlements in gold. The most likely possibility is, ignoring third countries, that the nations from which we now buy fewer imports will curtail transactions that give us credits. Specifically, the other nation, having less of our money to spend, will have to purchase less from us, de-

fault on some interest and dividend payments, be less accommodating in giving us short-term credit, and invest less in our country or repay us more slowly. It is impossible to say where most of the cut will come. However, if there is a proportionate reduction in all credit transactions, most of the curtailment will usually be in our exports because for most countries the balance of trade is the major part of the total balance of payments. If the other country is heavily in debt to us, so that a large part of her payments to us are for servicing and repayment of loans, and hence are relatively constant items, our exports will suffer disproportionately. Opposite results may be expected if the other nation was previously increasing her long-term investments in our country.

Of course the outcome also depends in part on how badly the other nation wants our exports and upon whether there are rival third countries that can supply these same needs if necessary. If we reduce imports by imposing tariffs, we shall suffer almost as large a reduction in exports and shall grant smaller loans to foreigners. The falling off in exports is in reality a blessing in disguise because this frees some factors of production for the satisfaction of domestic wants. However, there is still a net loss because some of the fruits of international specialization have been forfeited.

# Advantages for Labor

A number of the most widely quoted and frequently repeated of all protectionist arguments is addressed primarily to the working classes. This is not astonishing when one considers that a majority of people earn their livelihood in the form of wages and that industrial labor is politically vocal in many nations. It is especially necessary to mollify urban employees when agricultural protection is contemplated because the cost of food occupies a large place in family budgets. The following arguments, therefore, have great political significance despite their economic invalidity.

#### Safeguarding domestic wage standards

There is an enormous difference in wage structures amongst the nations of the world. The lowest wages paid in the United States are probably higher on the whole than in any other country. During World War II the War Labor Board of the United States ruled that wage rates below 55¢ an hour were prima facie substandard. This is more than most hired labor in China or India earns in a day even after taking differences in cost of living into account. It is not surprising, then, that the protagonists of protection have seized upon these wage contrasts to frighten workers in happier lands with the spectre of rival coolie labor.

First, we must recognize that wage rates and labor costs are not synonymous. Let us suppose the common labor rate is 40¢ an hour in Canada and 20¢ an hour in Italy. Let us further suppose that it takes 18 man-hours to make product A in Canada and 36 man-hours in Italy to make the same commodity. In this case the labor cost is \$7.20 per unit of output in both countries.

How is it possible for common labor to vary so in efficiency from one country to another? One explanation may be that each worker is combined differently with land and capital. Thus, the agricultural laborer in Canada has far more acres of wheat land to work with than does his Italian counterpart; likewise, the Canadian factory worker will be better equipped with automatic lathes and the rike. This is perhaps the most potent cause.

Another explanation, though, is that the workers in some countries may be personally more efficient because of superior health, education, or acquired skills. A great deal of the native labor in colonial areas suffers from malnutrition, disease, and parasites, so that it is physically weak and mentally dull. In some backward countries much of the labor force may lack sufficient education to read instructions or carry through simple calculations. A primitive mode of living also precludes mechanical ability; for example, a Rumanian peas-

ant may have trouble running a simple farm machine which would be as child's play to a Yank, reared from the cradle as he is with gadgets and appliances of all sorts.

It is unrealistic, however, to suppose that Canadian labor, for example, is twice as productive as Italian labor in all lines of production. An Italian woman making hand lace will on an average be the equal of a Canadian girl. In other occupations the Canadian may be more than twice as productive as the Italian. It is only the average difference in labor efficiency that is the cause of disparities in the common wage rate. This combination of differences in the labor efficiency of unskilled labor from trade to trade, coupled with a common wage rate irrespective of occupation, makes for differences in labor cost.

The resultant variation in labor cost often determines, especially where transportation costs are small and associated production costs are about the same in both countries, which country will specialize in what lines of production.

The arithmetic of this thesis is set forth in Table 26.

TABLE 26

	canada (40¢ hr)		italy (20¢ hr)	
PRODUCT	NO. MAN-HR	Labor Cost	NO. MAN-HR	LABOR COST
A	18	87.20	36	\$7 20
В	3	1.20	4	.80
C		2.00	15	3.00
D	_	.08	.3	.07
Ē	1.1	.44	2.5	.50

In terms of labor alone the cost of making product A is the same in both countries; products B and D can be made more cheaply in Italy; and products C and E have a lower labor cost per unit of output in Canada. Other things equal, Italy will produce B and D, Canada will make C and E, and both countries will turn out A. It is noteworthy that this geographic division of labor is based on relative rather than absolute superiority in the productivity of labor. Actually,

Canadian labor is more efficient in the making of all five commodities, but especially in the case of C and E, and least as regards B and D.

High wages in a country are evidence of its labor's competitive strength. High wages should be the subject of self-gratification. There need be no fear that these high wages will suddenly be snatched away by some foreigner because they were never bestowed by the foreigner in the first place. High wages depend on personal efficiency, available capital, and bountiful natural resources. These determinants rest on domestic foundations that cannot be removed by others.

A high-wage country is normally debarred from many lines of enterprise. Particularly nasty little jobs that cannot be done by machine will be left for foreigners to do. For example, horse-tail hairs used to be sent from the United States to China for sorting, after which the hairs were returned to this country for manufacture into brushes and other goods. The pay for sorting was a few cents per thousand hairs. Also, during the gold rush days in San Francisco, a considerable quantity of soiled clothes used to be sent to the Hawaiian Islands for laundering. This principle applies to the making of goods just as much as to the performing of services.

The important thing for the laborers of any nation is that they be allowed to work in the occupations for which they and their environment are best fitted, which is as true for groups as for individuals. A lawyer would resent a government decree that limited him to working as a secretary. Similarly, organized labor should not allow itself to be sidetracked by protective tariffs into lines of work where its superiority is markedly less or does not exist. This can only mean a reduction in real wages in the end.

## Reduce unemployment

(It is often suggested that protection will lessen unemployment. A negative and a positive argument are used to support

this proposition. The first is that domestic employers will have to lay off men owing to foreign competition from producers having lower costs. The second is that protection creates new industries which employ more men. There is also a third argument that is sometimes cited by free traders and which alleges that greater self-sufficiency means more work )

1. If foreign producers do enjoy lower costs, this is prima facie evidence that they are better suited to do the job. We have just demonstrated this in some detail regarding labor costs. The same kind of analysis is applicable to differences in capital cost, land cost, and therefore total cost. There will always be many occupations in which foreigners have lower costs just as there will be other enterprises in which we have lower costs. If we attempt to produce all things, we shall find ourselves with reduced supplies for consumption.

One qualification to the above-stated generalization is necessary. Sometimes foreigners will have an undue advantage because our costs are artificially high. The prices of intermediate goods used in production may be too high because of trade-association activities. Wages in some employments may be above the equilibrium rate because of labor-union pressure. In this case our domestic economy probably will produce too little, will be overly vulnerable to foreign competition, and there will be some measure of underemployment.

A nation's wage rates cannot be too high for proper employment if they had been determined in an environment of laissez faire, for under such conditions wages are based on the supply of labor offered by the domestic working force. However, supra-equilibrium rates can only be paid to the best workers by employers in the most favored lines of production. Reduced output means a lower level of living unless increased imports can be obtained by other means than additional exports. In short, lower wage rates abroad cannot cause unemployment at home unless our own rates are unnaturally high.

It is often stated that tariffs and quotas increase employment because protected industries either expand output or are freshly created.

Although it is true that there is more employment in protected industries, the real question is whether or not there is a compensating decrease in employment in the other trades. Whence do the protected occupations draw their extra labor?

The free trader is sometimes prone to assert that the total working force is more or less fixed in size and that increased employment in any one sector of the economy must be matched by decreases in other parts. This is rather too facile a view, however, as our experience with business cycles should prove. Economic history records large fluctuations in total employment over time.

Sudden and widespread protection probably does increase output temporarily because increased output requires preliminary capital construction far in excess of normal replacement needs. This argument must be analyzed in the same manner as that already considered under the title *Increased Output* (p. 266). In the long run, however, there is no theoretical reason for expecting increased employment unless there is an additional necessity to work.

3. Increased protection means a further sacrifice of some of the productive efficiency of geographic specialization. This is the more readily perceived if we imagine what self-sufficiency would mean in the case of a small area, such as a county or city. If your county had to provide for all its own consumption it would be hard pressed to supply a wide range of goods. In order to sustain even a lower level of consumption, it would be necessary to increase the man-hours of work done. People would be toiling from sunup to sundown in order to eke out a miserable subsistence. This is what occurs in less drastic degree when a nation denies itself the advantages of unrestricted commodity trade. Securing increased employment in this way is nething to be proud about: it is economic retrogression.

It would be quite impossible for protection to eliminate unemployment because so little of it is attributable to foreign competition. Most unemployment is caused by (1) job changing, (2) seasonal and cyclical fluctuations, and (3) personal inadequacies. Protection will not shorten the interval of unemployment which often exists when a man changes his job because he is dissatisfied or wishes to move to another part of the country. Protection cannot neutralize the weather and holidays which are responsible for much of the existing seasonality; and it is very unlikely that protection will prove a substantial remedy for the business cycle. Protection will not cure people who cannot hold jobs because they are physically incapacitated, temperamentally unsuited, or mentally inadequate. Finally, in some countries, the reported volume of unemployment is a statistical illusion. This figure may be obtained by subtracting those who are gainfully employed from the number who state they are willing and able to work. A great many married women and young and old of both sexes often include themselves in the nominal labor force, but if economic necessity does not press too hard, they may be "choosy" about the jobs they accept or work only intermittently.

#### Increase labor's share of national income

A theoretical but selfish case can be made for using protection to increase labor's share of the national product. Such a theory is primarily of scientific interest and has never been implemented. But it is a *curiosum* worthy of mention.

The production of some goods requires a great deal of labor relative to the joint demands for capital and natural resources. These might be called *labor-using* goods. Similarly, other products might be described as *capital-using* or *land-using* goods. Of course, a long list of products have more normal need of all three factors and hence might be considered *neutral*.

A tariff system that excluded labor-using imports, but permitted all other goods to enter duty free would probably so

increase the domestic demand for workers that labor would benefit more than enough to pay higher prices on some consumption goods. (This same argument could be rephrased to take care of landlords or capitalists.) However, the economy as a whole would almost surely lose. Accordingly, the persons whose incomes come from rent, interest, and profits would presumably suffer more than those who live on wages would gain. This is hardly an unexpected result because the satisfaction of a special interest usually inflicts an injury on the general welfare.

## Economic Stability

The popular trend is all toward greater stability in prices, incomes, production, and other economic quanta. Whether the attainment of these ends is possible or advisable will not concern us here. The fact remains that governments respond to public demand by attempting to calm unsettled conditions and control the economic climate, and because some of these disturbances seem to come from abroad, tariffs and quotas have often been suggested as regulatory devices.

## Stabilize domestic prices

Certain nations, which import part or all of some specific goods they use, have attempted to ensure domestic price stability through sliding-scale tariff rates. One of the most notorious of such attempts were the English corn laws, which were continually being amended over a period of several centuries and which were not repealed until 1846. These tariffs and those imposed by such continental powers as Sweden and Holland had a sliding rate, which was periodically adjusted upward and downward according as domestic prices for the same commodity fell or rose. For example, the British corn laws of 1827 attempted to stabilize the domestic price around 62/6 a quarter by changing the duty 2/- for every 1/- variation in price.

Sliding rates of this kind opened the door to conspiratory

manipulation, and enhanced price instability. Speculators, acting in concert, would withhold supplies and force prices up so that the tariff would be lowered. They would then take advantage of this to import excessive supplies, which they would put on the market fast enough to lower prices slightly and so compel the government to raise the duty. This sad outcome rested on an improper way of adjusting the duty rate and is not an inevitable defect of sliding-scale tariffs.

The duty rate should be specific and equal to the desired domestic price minus the *outside* or world price. It can then be varied from day to day or week to week as prices move on some recognized commodity exchange abroad. Under such a scheme there is little if any profit to be realized from importing or selling by fits and starts. It is always possible that the world price may go above the desired domestic quotation. This may be frequent and prolonged if the government's policy is to keep the domestic price only slightly above the average outside price. Logically, and if we apply the above formula algebraically, the government should pay a subsidy when this occurs.

If the government is interested in price stability rather than protection—that is, if the desired domestic price is about equal to what is estimated as being the normal world price—the government will be paying out as much and as often as it is taking in. Under these circumstances the government might do better to assume a monopoly of the importation and enter into business for itself. Switzerland did this for wheat as long ago as World War I.

Price stability through the control of imports does not require protection because there is no necessity for the domestic price to be higher than the world price. Subsidies will counterbalance tariffs when there is no net protectionist effect, and the government might as well be responsible for all imports. To the extent that tariffs outweigh subsidies, so that the domestic price level is generally kept above that of the world, the usual arguments against protection apply with full force.

## Prevent dumping

(Special antidumping duties and quotas are to be found on the statute books of a majority of the leading commercial nations.) Often the executive arm of the government is entrusted with authority to apply these special rates at its discretion, and during the great depression of the 1930's these rates were frequently invoked. However, (dumping, like most phenomena having a vague antisocial association, is varied in character, difficult of detection, and uneven in incidence.)

Dumping has been defined in various ways. Some statutes refer to depreciation dumping, which is the forcing of exports by an artificial devaluation of a currency. Most economists, though, reserve the term dumping to a special case of price discrimination where the net price on foreign sales is less than that received on domestic business. For example, a German manufacturer of water heaters in Hanover, who sells one of his models at home for RM 300 f.o.b., would be dumping if the price he quoted in Brussels was the equivalent of RM 330 despite customs and freight of RM 50. Hence, dumping may occur even though the foreign gross price is above the f.o.b. quotation. On the other hand, asking an unprofitable foreign price is not necessarily dumping, for the domestic price may be even lower by the amount for freight, and so on. This concept is quite unrelated to costs of production.

It is customary to distinguish between three kinds of dumping as defined above.

Persistent Dumping. It often happens that large firms sell continually in a number of different national markets. If such a firm sells a <u>differentiated</u> product—that is, one that is not identical with the output of rival companies—it will have a different demand curve for its product in each market, and all will be negatively inclined. Or it may be that a number of firms making a homogeneous product have a cartel arrangement in one market (which gives them a sloped demand curve there) but that they have to face full competition in other countries

(which gives them a horizontal sales schedule throughout the remainder of the world). In both these cases there will likely be price discrimination, and it may be that this takes the form of a lower net price on foreign sales. Dumping of this kind is perfectly normal, merely constitutes an attempt to maximize profits in each separate market, and usually continues indefinitely. The different prices result from the different demand conditions. (See Chapter 10).

An outstanding example of this kind of dumping was afforded by the German steel cartel before World War I. The cartel delivered steel plate to England at the competitive world price prevailing there. In this it had no choice if it wished to sell. But the price in Germany was almost twice as high because the home market was cartelized and protected by a sufficiently high tariff. This policy proved to be a great boon to the British shipbuilding industry and a great source of complaint to its German counterpart because both were large purchasers of steel plate. It is remarkable that this dumping entailed a home price that was too high rather than a foreign price that was too low. The explanation in large measure is that Germany had protection and Britain had none.

It might well be asked why the importing country should object to this kind of dumping, since it does not bring about unstable conditions because the dumping price does not fluctuate especially. The existence of whole industries may be eased by being able to obtain cheap imports of some necessary material. It seems ungrateful to object.

Intermittent and Unpremeditated Dumping. An individual producer of a differentiated product sometimes manufactures it for the home market. Sales policy may dictate that he announce his price at the beginning of the season and that he does not subsequently reduce it. It may be that his production plans are too optimistic or that demand turns against him during the period in question. In this event he may not be able to sell his entire output at the publicized price; however, rather

than spoil the market by an eleventh-hour price cut, he gets rid of his surplus inventories abroad at the best figure he can obtain.

Identical results may accrue from a government setting a minimum price for some undifferentiated commodity which is too high. Producers then supply more than the domestic market will take at this price, and it is illegal to sell there for less. But circumstances may compel a producer to sell—perhaps the product spoils or he needs money and cannot get a loan—in which case he will have to resort to a foreign market. Selling abroad will probably net him a lower price if either the domestic or foreign market is protected.

Dumping of this kind is upsetting for the receiving country. Whether it obtains imports depends upon whether demand conditions in the exporting country are below or above expectation. Schemes for promoting price stability in the exporting country thus generate price instability in the importing country. This will be particularly trying for the receiving country if it produces part of its needs because then it will contain economic groups whose incomes are made to fluctuate severely; for, in years when dumping occurs, the producers in the importing nation suffer from both a price and a quantity effect. Protection may be justified under such circumstances. What form it should take is discussed at the end of this section.

Predatory Dumping. Powerful competitors occasionally use localized dumping as a weapon with which to destroy their weaker rivals. In many countries such practices are now illegal when carried on within the nation. However, the same government may permit its producers to combine for purposes of predatory dumping in foreign markets. Dumping of this kind is short-lived and lasts only for so long as competition survives. The price is lowered now so that it can be raised with impunity later. It seems perfectly reasonable that a country should protect its producers against this kind of dumping so long as they are equally efficient in terms of costs. They should not be sacrificed simply because they are possessed

of limited financial staying power. The real problem here is whether protection should take the form of a tariff or quota and how it ought to be administered.

Dumping to Acquire Foreign Exchange. Highly controlled economies, such as those of the U.S.S.R. and the former Third Reich, are sometimes in sudden need of foreign exchange. One obvious means for obtaining needed foreign exchange is to sell exports, and if they are moving too slowly and the demand is elastic, to cut prices. During the early 1930's the Soviet Government sold timber and fish from time to time at extremely low prices in the North European market. It was alleged at the time that Russia was trying to wreck markets and swell unemployment. A more probable explanation seems to have been that Russia needed foreign exchange with which to pay for capital goods imports, set about accumulating this exchange too late, and at the last moment sales were forced by sacrificing price. It is also possible that the Soviet Government was compelled to take a lower price because of unfamiliarity with the proper distribution channels. These episodes were certainly not in the interest of Russia, and in the future a repetition of such incidents will possibly be avoided by better planning. However, the effect of such sporadic sales at low prices was extremely unsettling. Here again the government of the receiving country is justified in obstructing imports.

Protection against Dumping. (The persistent type of dumping is not objectionable because the importing nation can adapt itself to enjoying these goods at low price. All other kinds of dumping may be so unsettling that the temporary advantage of a low price is insufficient compensation.) What should be the remedy in such cases?

One proposal which immediately comes to mind is that a specific duty equal to the amount of the price discrimination be imposed. However, this is very hard to administer. No antidumping rate can be applied until the producer has made a bona fide sale and the selling price is known. Moreover, the

original producer will often retain ownership through customs and only cut prices afterwards. It is impossible to police subsequent sales, and it is impracticable to require preliminary sale. Customs officials cannot always find out the prices the producer is asking at home and cannot determine either whether these quotations refer to the same goods or the terms of sale. Dumping that is sporadic rather than persistent can usually avoid the application of antidumping tariffs so that it is usually a case of locking the stable door after the horse has gone. Quotas are often suggested as an alternative remedv. and it is true that they can cope with dumping as well as with any other kind of importation. However, quotas have several peculiar weaknesses which are enumerated in Chapter 16. Another problem that is incident to protection against unwelcome forms of dumping is that it is often impossible to distinguish in advance what is and what is not a form of unwelcome dumping.

(The frequency of dumping can perhaps be lessened in other ways. Dumping to obtain foreign exchange would hardly occur if better credit facilities were available. Predatory dumping can perhaps be checked by the application of domestic unfair-trade laws. Another possibility, but one which unfortunately strikes at persistent dumping also, is to attempt the negotiation of treaties that guarantee duty-free re-entry of all goods into the country of origin.)

One must recognize that concern over dumping is often a tactical maneuver to obtain greater protection against all imports that are sold at lower prices than domestic producers favor. There is inevitably so much uncertainty and arbitrariness in the administration of antidumping duties that they can usually be employed to obstruct cheap imports in general. Their ostensible purpose and actual effect may be altogether different. In view of this fact, and bearing in mind that by no means all dumping is harmful, a great many economists have come to the conclusion that antidumping tariffs and quotas have fewer potentialities for good than for evil.

## Diversify and insulate home economy

The economic history of most countries is one of ups and downs, and these business cycles often appear to be engendered by alternating prosperity and depression in neighboring lands. It is politically expedient to blame one's ills on others, and there is much truth in the contention that business conditions vary on an international scale. Unhappily, the outcome is all too often a demand for protection!

A majority of the world's nations export a limited line of goods. Some of these nations are loosely described as one-crop countries. Many of these goods are raw materials, and such goods are notorious for their price fluctuations over the business cycle. The entire national economy of countries like Australia, Venezuela, Argentina, and New Zealand is extremely susceptible to world conditions. The proceeds from their exports may be only one third as great in bad times as in good. Unfortunately, the prices of the manufactured goods they must import, and payments therefor, do not fall as much. and the international debts they owe become a greater real burden.

It is not surprising that public opinion in these countries seizes on increased productive diversification as a depression remedy. The export market has lost its attractiveness, and there is not enough money to buy imports. Why not divert idle productive resources to making such goods at home instead? In the short run this may appear to be common sense. However, by the time the various shifts in production have been brought about through protection, world prosperity may have returned, and the nation will not be in a position to benefit from it. The specialization of free trade is still the best long-run policy in most cases despite occasional periods of tribulation.

Governments of the largest nations are often conducting various socio-economic experiments on their citizens, and such governments desire controlled laboratory conditions. A demand for a greater degree of insulation from other countries may then arise. The period following World War II may be characterized by the rise of controlled economies. Domestic planners of all shades are interested in reducing the number of elements with which they must work. These planners are especially hostile towards variables that are beyond their jurisdiction. The all-too-human escape is to prevent external interference by throttling foreign trade. This explains the trickle of trade which normally flows between the Soviet Union and the rest of the world. It also explains why the United States has had to maintain wheat and other agricultural tariffs. One of the prices that must be paid for domestic economic programs is self-denial of the advantages of national specialization. The purchase is not always a bargain.

## Chapter 15

## Pleas for Protection (Continued)

## Economic Development

THE four protectionist arguments discussed below may be grouped together inasmuch as they all purport to hasten or improve economic development. There is an implicit assumption in each case to the effect that a free-trade system, however well it may arrange resources and other matters within any given period, somehow degenerates when it is applied to relating economic components to one another over time.) Justification for this assumption is seldom if ever attempted. Apparently it is held to be another of those self-evident truths used to extricate debaters when they find themselves in a corner. Unfortunately, disproof is as impossible as proof. The resultant uncertainty has served to preserve the vitality of these protectionist arguments.

## Rear infant industries

This argument is at least as old as Alexander Hamilton and Frederick List; hence it is more than a hundred years old. These two publicists, thinking in terms of the United States and Germany respectively, wished their own countries to develop industrially. This was exceedingly difficult under conditions of free trade because Great Britain already possessed entrenched manufactures with established trade connections throughout the world. Both Hamilton and List lamented the slow progress their domestic industries were making in the face of such stiff rivalry. They wished to ensure the economic destiny of their countries by giving "infant industries" a meas-

ure of protection until they could stand on their own feet. It was held that this "nursing period" was necessary in order that entrepreneurs could gain experience, a sufficiency of skilled technicians could be trained, and subsidiary supplying trades could be built up. Both Hamilton and List disclaimed any sympathy for weakling industries, which would be unable to survive even in maturity without the help of a tariff.

Essentially, this argument is an assertion of fact and should be treated accordingly. The real question is whether or not there are some industries that (1) are justifiable and self-financing in the long run, (2) inevitably sustain losses during their early years, and (3) would never be established in the absence of protection. No trade can be considered an infant industry unless it meets all three tests. A further very practical problem if this policy is to be executed is that infant industries must be recognizable as such before they receive protection.

But how are legislators to recognize infant industries in advance? Current losses can be verified, but it is largely conjecture whether or not an unprofitable industry will eventually emerge from the red. This uncertainty is dangerous because one can be sure that all new trades that suffer losses will claim protection as "infants," irrespective of any possibility of attaining satisfactory adulthood. Finally, how is one to know that the prospect of initial losses will deter capitalists from establishing a new industry? Most successful trades commence with losses, as is illustrated by the automobile industry; but private funds are usually forthcoming to carry the business through hard times.

We are now approaching the crux of the matter. There are a great many possible new lines of production which, after early losses, are expected to earn profits. At what point do the later profits outweigh the early losses? In the case of private investment this is largely controlled by the interest rate. If the rate is high, as is often the case in new countries, later profits will be very heavily discounted and will not compensate

for the more immediate losses. In this case private investors will not provide the necessary funds, and we must ask ourselves if the industry's establishment is truly worth-while. If our answer is in the affirmative, we are in effect saying that the going anticipated interest rate, used for discounting, is higher than it should be, and that the economy is paying less attention to the future than it should. Theoretically, the government of the day should decide how much lower the proper interest rate ought to be, otherwise it will not know how far it can go in approving new industries that, by all ordinary financial tests, are unsound and unjustifiable.

If a government believes a prospective industry is economically worth-while, but this industry seems unable to obtain the necessary capital funds from private sources, the government should invest in the new trade openly and directly. The customary alternative, however, is to compel consumers to pay higher prices by means of passing a tariff; thus, in effect, buyers are forced to donate the needed funds. In the event that the early financial storms are successfully weathered, it would seem only elementary justice that these consumers should later be rewarded by passing on to them potential profits in the form of exceptionally low prices. In other words, a new industry which becomes established through indirect consumer subsidization is thereafter affected with the public interest, and its prices should perhaps be regulated accordingly. Naturally, this never happens.

The infant-industry apology for tariffs is one of the few protectionist arguments to which free traders pay grudging lip service. It is conceivable that the situation so often described might occur. The practical difficulty is to detect it in advance. Little political perspicacity is required to realize that an infant industry that has become established behind a protective tariff has also become a powerful vested interest capable of sustaining legislative lobbies. Protected industries naturally cling to their tariff privileges whether or not they could exist without them. History is replete with in-

stances of infants that secured protection, but history is empty of cases that subsequently grew up to admitted manhood. The infant-industry argument has been used as a Trojan horse too often.

#### Establish "tariff factories"

Agrarian countries often desire to become industrialized. Occasionally, they seek to accelerate this development by passing tariffs against finished products, and so they force foreign manufacturing companies to establish branch factories within the domestic customs area. During the 1920's Canada followed this policy with some success, especially as regards American corporations.

However, it is a mistaken idea that all these new tariff factories add to a nation's stock of capital goods or wealth. In the first place, the country in which the branch factory is located pays for it sooner or later. This is quite obvious if the factory is constructed from funds raised from local investors. It is also true if the tariff factory is built from funds or with equipment loaned or sent by foreigners. In this event ownership is vested abroad, and the full cost of the factory will be paid as amortization or depreciation and as interest or dividends.

Secondly, the total capital investment of the country is probably not increased. In other words, the new tariff factory is a substitute conglomeration of capital goods. If the factory is financed from local funds, it is probable that domestic investors will have to reduce correspondingly the alternative loans they would otherwise have made; and if the tariff factory is foreign-financed, the home country's ability to repay and service alternative borrowings from abroad is commensurately reduced—that is, unless the factory's innovation increases the nation's credits or reduces its debits. There is no a priori reason for expecting this to happen.

There are, however, sound theoretical reasons for doubting the desirability of forcing hot-house factories in this way. If the branch factory would not pay under free trade, it is hard to see how a reduction in real income can now be avoided, since costs are presumably higher under the new mode of operation. One exception to this conclusion would be if the foreign company had previously been following a monopoly-price policy and earning some monopoly profits. In this case the home price might not be changed, and some profits that had been previously drawn off to a foreign country might now be dissipated as uneconomic costs within the home nation. Occasionally, too, there may be little thange in efficiency or costs. but a natural unwillingness of a foreign company to invest outside its own nation has been overcome. In time of war it may be useful to have factories inside one's territory irrespective of where their ownership may reside. During World War II American branch automobile factories proved to be a godsend to more than one belligerent nation in Europe. However, these exceptions are all based on special circumstances: in the normal course of affairs no valid case can be made in favor of encouraging tariff factories.

#### Induce economies of mass production

Increasing returns are a characteristic of many lines of production, such as steel rolling mills, where overhead costs are an important consideration. In this case it often happens that there is only room for one or two such plants in a number of adjacent countries. Which countries are to have these industries is largely a matter of which starts first. A protective tariff may encourage a quick start and ensure attainment of volume production and its attendant cost advantages at an earlier date. Thereafter, the home industry will be able to dominate foreign markets through its ability to quote low prices—so runs the argument.

It is questionable, though, whether a tariff will give a quick start to the industry at home. The promoters of this new business will probably be more conscious than the government of the importance of beating the gun. They will realize this first, and then will educate public and official opinion to their way of thinking. The second point, that the industry with prior establishment can undersell competitors in foreign markets, is true only as far as other countries with the same industrial ambitions do not erect infant-industry tariffs to protect their young hopefuls. And if foreign countries are not potential competitors, then there is nobody to undersell there, and this second point becomes insignificant.

## Preserving the National Existence

Several arguments for protection appeal to the public on the grounds that tariffs and quotas can be employed to sustain the national existence and aid the government in carrying out its essential responsibilities. Governments must be financed, and tariffs are lauded as a source of revenue. A nation must be able to defend itself, and it is claimed that protection can encourage preparation to this end. An economy needs natural resources, and it is alleged that tariffs can help to conserve these prerequisites of prosperity and power. What is the basis of these extreme claims?

#### Government revenue

An attempt is often made to sell tariffs to the tax-paying public on the ground that this is a way of raising sorely needed revenue for the government. Sometimes it is suggested that customs duties are a superior mode of tax gathering either because the foreigner pays the duty or because the same tariff rate occasions both revenue and protection. More moderate apologists represent tariffs as being merely an alternative way of financing the government, which is neither better nor worse than any other.

It is noteworthy that these arguments are not for protection in general, but simply for a tax on imports. They are not pleas either for quotas or for what is often described as administrative protection.

Free traders have denied that tariffs kill two birds with one

stone by providing revenue and protection at the same time. They claim that a tariff that protects will not realize revenue, or vice versa; and in support of this contention they point out that a prohibitive duty, which excludes all imports, will bring in no money. However, this is not a logical argument, and one could just as well take the position that both objectives are compatible because a zero tariff rate yields neither revenue nor protection. Reasoning from extreme cases such as these is altogether too treacherous. The truth of the matter is that up to a critical tariff rate, revenue and protection are both achieved, but higher duties than these realize less revenue with more protection.

The question of who pays the tariff has already been touched upon. In nearly all cases the portion of the duty rate paid by the foreigner is many times less than that paid by the domestic consumers. And the foreigner pays none of the duty where the supply of imports is infinitely elastic. It is never true that foreign producers pay the entire duty rate.

However, it might be argued by the protectionist that even in those cases where the foreigner pays only some of the duty—that is, when the supply schedule of imports is positively inclined—this is enough to render tariffs a preferable way of raising tax money. This is incorrect, particularly where there is rival domestic production, because the protection unduly stimulates high-cost producers at home and hence diverts resources from more efficient employments.

Even though it is admitted that tariffs are not a superior way of raising government revenue, it still might be argued that they are as deserving as many others used for public financing. They have certainly been productive in the past. In the early years of the history of the United States, customs duties were responsible for almost 99 per cent of the Federal government's revenue; but the proportion fell as low as one per cent during World War II. This tremendous drop is relative rather than absolute, and is attributable to the large sums brought in by other levies, such as personal and corporate

income taxes. Also, it is probably true that the tariff structure of the United States has been elevated to such protective heights that it is no longer effective in raising revenue. In some countries, though, and notably in Great Britain after World War I, customs duties comprised over one quarter of the government's receipts.\(^1\) The principal duties were on such commodities as sugar and tea, and champagne and brandy. There was no protectionist motive behind these duties because Great Britain did not produce such goods at home. The rates were kept low at what it was hoped was the most productive level. These customs duties were essentially commodity taxes and might have been collected as an excise from wholesalers throughout the country. However, it was more convenient and economical for the government to enforce the tax in the form of a duty on arrival in a United Kingdom port.

Most free traders are willing to condone import duties on goods that are not produced at home on the grounds that, inasmuch as this is not discrimination against imports, no malallocation of resources takes place. This is approximately true, although it should be remembered that different commodities are often in rival supply as a means of satisfying the same general want: for example, a duty on French brandy entering Britain provides an artificial stimulus to domestic whiskey distillation, and home-produced milk is a partial substitute for imported tea.

Free traders will also concede that it is only proper, where certain domestic goods bear excise taxes, that a corresponding import duty should be levied. The Canadian government, for example, imposes a domestic manufacturers' sales tax of 12 per cent, and to keep the score even, levies the same charge on imported manufactures. Otherwise there would be a tendency to favor imported goods as against their domestically produced counterparts. A tariff is much more likely to be productive of revenue under these circumstances because when

In 1935 the central government of the United Kingdom received 27 per cent of its receipts from customs duties. For the United States during the same fiscal year, the corresponding figure was 9.5 per cent. or 486 million dollars.

imports are excluded, a tax will still be obtained from the domestic producer.

Granted the theoretical validity of this position, it is sometimes a little hard to know how to apply it in practice. Supposing Country A has an expensive system of unemployment insurance for industrial workers, half the cost of which is financed by payroll taxes, whereas Country B, which practices an extremely rugged form of individualism, has no insurance or taxes of this kind. Should the producers in A be given compensatory protection in the form of a tariff on goods being imported from B? The argument might be carried further. Country A may have elaborate social services of all kinds, and hence a high tax bill, much of which falls on business in the shape of local property and corporate income taxes. Country B has fewer services and low taxes. Does this justify protection? On the other hand, reverting to the case of the Canadian manufacturers' sales tax, should a corresponding import duty be charged on goods imported from a country which also has this tax? In this case an import duty does not equalize the burden on domestic and foreign producers, but imposes a special handicap tax on the alien. And what of the case where the manufacturer in A has a sales tax, but no payroll assessment, whereas the manufacturer in B has a payroll assessment but no sales tax? The burden may be about the same, but it will be borne on a different shoulder.

This entire question is complex and is of considerable importance. In peacetime most increases in government expenditure, and hence novel demands for revenue, arise from the extension of social services of all kinds. The introduction of such services is often resisted on the grounds that taxation to finance them will make domestic industry and agriculture too vulnerable to foreign competition unless protection is provided. This point is exceedingly well taken because domestic commodity taxation, without compensating tariffs, can lead to an opposite misuse of resources than would a tariff that stands alone. However, the task of adjusting a multitude of separate

tariff items in such a manner as to balance the weight of different nations' tax structures with that of one's own country is a statistical impossibility. Logically, it would result in a distinct duty rate being applied against each commodity, depending upon its country of origin; but to deny any protection may retard progress in our social legislation.

There is no clear-cut solution to this problem; no single formula will fit all the facts; each case must be spttled on its own merits. In some instances a good argument for protection can doubtless be made; however, care should be taken that greedy interests do not exploit the statistical uncertainties to gain excessive protection for themselves.

#### National defense

Many people who agree with the principles of free trade qualify their position by supposing that protection may sometimes be required in order to sustain lines of production that will be needed in wartime. This is frequently the argument used to secure protection of steel and metal-products industries and for certain branches of agriculture. Such strivings for an unnatural degree of self-sufficiency are often admitted to be wasteful, as judged by peacetime standards; however, in a world periodically wracked by wars, economic inefficiency of this kind must be reckoned as another of the penalties exacted by human folly.

In war, more than any other time, productive efficiency is vital. Geographic specialization within those economic areas that remain accessible is essential. Nowadays wars are on a world-wide scale between groups of nations. There is general economic intercourse among most of the allies ranged on each side. Moreover, belligerent nations can usually exchange goods with some neutral countries or perhaps with lands which have been invaded. During World War II Germany could draw on the resources of almost the entire European continent. Japan, at the zenith of her power, could loot a considerable area. The Anglo-Saxon powers, as long as they retained

seapower and controlled the necessary merchant shipping, could practice international specialization throughout much of the world. Experience proves that goods are transferred amongst countries in greater volume during periods of hostilities than at other times. Economic strategy dictates that allies specialize and co-ordinate their productive plans.

There are some exceptions to this general principle. Transportation may be so overworked by moving troops and equipment that local areas must rely more on their own efforts. It may be difficult to finance imported war goods, and the exporting nation may refuse to take goods in exchange. Accessible foreign countries may not make certain vital goods such as optical instruments and machine tools, in which case domestic subsidization becomes expedient. However, these qualifications are based on special circumstances. As a general rule war is the worst possible time, since productive manpower is lost to the armed services, to throw away the greater output that geographic specialization yields. And nations which are so situated that enemy blockade will force them to be self-sufficient, would be well-advised not to go to war, offensively or defensively.

#### Conserve natural resources

Many countries are using and exporting certain of their natural resources at such a rate that the supply of these resources is threatened with exhaustion in the not distant future. This has been true of petroleum in the United States, copper in Mexico, and Douglas fir timber from Canada. Some persons have argued that where these commodities are exported, protection would lessen the rate of exploitation because foreigners would then have fewer funds to buy our exports.

There are several objections to this argument. First, export of exploited natural resources may be unimportant relative to domestic use. Second, the relationship between imports in general and specific exports of natural resources is extremely indirect unless trade debits and credits are about in balance,

and almost all exports are natural resources which should be conserved. Third, there are far more direct means for conserving scarce natural resources. The government can pass conservation laws and regulations. Most countries, except the United States where it is unconstitutional, can impose export duties on natural resources that foreigners are getting too cheaply. Fourth, extractive economies are usually still immature and must import a wide range of manufactures, for which they pay with exports. If the natural-resource exports are to be curtailed by some direct means, it will be hard enough to acquire the desired imports without excluding them by tariffs.

We should like to point out in conclusion that here is a protectionist argument which recognizes that imports and exports are related through the balance of payments!

### Miscellaneous Arguments

Three arguments for protection remain which evade neat classification, and hence are listed under the above heading. Frequent repetition has given them popular authority and political weight. One of them, the equalize-costs-of-production argument, supposedly provided the raison d'être of the United States Tariff Commission.

## The foreigner pays the tariff

It is often claimed that the foreign exporter bears the burden of an import tariff, and hence can be made to contribute to the treasury of the home government. This argument appeals to antiforeign prejudices and human greed, but its emotional strength is offset by weak economic analysis.

The shifting of customs duties has already been examined in Chapter 13. It was there demonstrated that none of the duty will be borne by the foreign exporter, in the sense that he must accept a lower net price, if the imported supply of the commodity in question is infinitely elastic. If the import supply is less than infinitely elastic, so that more units will be

supplied by foreigners at a higher net price to them, the alien exporter will in effect pay a part of the tariff. However, in almost all cases the domestic importers will pay most of the duty because the demand for imports is usually less responsive to price changes than the supply of imports. The reason for this is that the market provided by most importing countries is only a minor part of the world market for the good concerned.

A proponent of tariffs might fall back to a second line of defense, and assert that it is better to have government revenues raised in part from foreigners. Practically, however, there are very few instances of goods being imported under conditions of low elasticity. In these special cases the importing country has a measure of monopsony power, which it might exploit to its short-run advantage by levying a duty (Chapter 10). However, policies of this nature invite retaliation, and thereby threaten universal injury. The claim that the foreigner pays the tariff cannot be made an argument for any other form of protection than a customs duty.

## Tactical use of tariffs and quotas

It is sometimes contended, especially within nations that have little or no protection, that this state of affairs cramps the government in attempting to induce other nations to lower their tariffs. It used to be said in Great Britain, for example, before the innovation of systematic protection in the early 1930's, that the United Kingdom government had no bargaining weapon with which to pry open foreign doors closed against British exports. This argument also applies to incorporation of the most-favored-nation clause in commercial treaties. A free-trade country gives nothing when it grants this clause, and accordingly other governments are reluctant to extend this privilege gratis in return. People who present this argument usually pay lip service to the ideal of freer trade by suggesting that temporary protection is the most practical maneuver to effect it.

It seems a little circuitous and dangerous to seek freer trade by first restricting it more rigorously. Vested interests are likely to make sure that what was intended by some as temporary protection will prove permanent in the end. Moreover, in treaty negotiation the promise not to increase a tariff rate is often as sharp a bargaining weapon as an agreed reduction. Half of the undertakings contained in some of the trade treaties negotiated by the United States State Department are bindings rather than cuts.

Sometimes protection is urged in retaliation against foreign tariffs and quotas. This is tantamount to cutting off one's nose to spite one's face. Protection normally injures the nation that enacts it as well as the foreign economy: both sides suffer a loss.

This is the fundamental point so often missed by the public and by government officials. Reducing one's own tariffs admittedly benefits the foreign country to some extent, but it gives an even greater advantage to the domestic economy. The true interests of different nations, except in certain monopoly cases, are not in conflict. Whatever clash of interests does occur is between domestic producers and users of the protected goods. Protection should logically give rise to civil war rather than international conflict.

## Equalize costs of production

A once popular program, and one which especially appeals to our sporting instincts, is that tariffs should be adjusted to neutralize any cost advantages possessed by foreigners, after which, may the best man win.

Those who place great trust in the beneficial effects of commercial competition are often illogically attracted to this policy. If competition realizes worth-while economies within a country, it ought to possess even wider potentialities for good when practiced on an international scale. Competition does not lose its virtues whenever a boundary happens to separate rival producers.

There are many practical difficulties to a flexible tariff as here proposed. How is a government agency to ascertain foreign costs of production when it has no subpoene powers abroad? Costs of production are constantly changing, and depend in part on volume of sales, and hence in turn on exports and domestic tariffs. Different countries and different firms have different costs of production. Is there to be a special rate for each country or firm?

The basic objection to this argument is that the economic problem cannot intelligently be likened to a handicap race. It makes no sense to tie back one arm of the most efficient producers. This is no way to solve the universal problem of how to satisfy a few of our insatiable desires with the least possible exertion.

If the rationale of this scheme has any real logic, it would seem that countries that on an average have higher costs should be granted a subsidy in order that they might no longer labor under a disadvantage. Surprisingly enough, this is never suggested!

Some free-trade economists have carelessly supposed that such a neutralizing use of tariffs, by eliminating all cost advantages, would bring about a cessation of international trade. This might be true in the long run. In reality, though, goods move among nations according to short-run considerations, and there will always be a number of foreign firms whose prime costs will be more than covered by the domestic price even after deductions are made for the customs duty.

#### Concluding Comments

The above list of twenty-odd protectionist pleas might impress some readers by its very length. The list is long because each argument is based on some special and extenuating circumstance, and economic life is highly varied. Moreover, there is an intellectual satisfaction to be derived from discovering possible exceptions. By way of contrast, a general principle can often be stated in a single sentence. So it is with the

case for free trade; but such brevity does not gainsay its weight or truth.

(Most of these arguments are incompatible. Some of them apply only to tariffs and are quite inapplicable to other forms of protection. They often have objectives which are at variance with one another, as for instance increased efficiency and national defense. Occasionally, the arguments are based on conflicting assumptions, as is illustrated by one argument that may suppose that trade credits and debits balance, whereas others may presume the opposite. In short, all these arguments cannot be simultaneously valid; whenever some are acceptable, others must be rejected.)

These arguments vary greatly in strength. Some are of a high scientific order whereas others are of the crudest sort. A few pleas, such as the conservation argument, are so weak as to reflect on the sincerity of their advocates.

Occasionally a sound policy can be rendered harmful through political misdirection. For example, the infant-industry suggestion may often merit initial acceptance, but in the end it will be exploited by selfish interests to the detriment of the nation. A good idea can often be put to bad use. Edgeworth summed up the matter aptly when he wrote:

"... protection might procure economic advantage in certain cases, if there was a Government wise enough to discriminate those cases, and strong enough to confine itself to them; but this condition is very unlikely to be filled." 2

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# Chapter 16

# Trade Control: Import Quotas

IN THE three preceding chapters we analyzed the nature and the effects of the limitation of foreign competition by means of the tariff. This limitation on foreign competition, which benefits interests more powerful than those it harms, serves to guide productive activity in particular directions rather than to regulate such activity. (As a general rule, individuals opposed in principle to the intervention of the state in business have been warm supporters of the view that it is the duty of the state to afford reasonable tariff protection. An outstanding reason for this attitude is that tariff control uses market forces—that is, prices—to influence the free choices of individuals in a particular way.) Free choice is not prevented under the tariff, since the individual may realize his choice if he is willing to pay the requisite price. All this is but an indirect way of saying that the tariff, as such, does not impose quantitative restrictions on international trade.)

(When governments restrict the range of available alternatives by preventing certain choices that otherwise could be made, some of the methods employed consist of regulations imposing quantitative restrictions on international trade. Among the leading quantitative restrictions are devices known as import quotas.) Five types of quotas may be distinguished: (1) the tariff quota, (2) the unilateral import quota, (3) import licensing, (4) the bilateral quota, and (5) the mixing quota. We shall first describe each type, and then consider the effect of quotas on foreign trade and prices.

#### The Tariff Quota

(The tariff quota is a device whereby a certain specified quantity of a particular commodity is permitted to enter the country under a special low rate of duty, but any additional amount is free to enter at a higher rate of duty. ) This type of quota, therefore, combines the features of both the fixed quota and the ordinary tariff. An example of the tariff quota in the United States is that on Cuban cigar-filler tobacco, the highly aromatic component that imparts that something to good cigars in the same way that salt and pepper impart something to a good beefsteak. In recent years the tariff quota on this tobacco has been 22 million pounds annually, dutiable at 14¢ a pound. American cigar manufacturers are free to import any additional amount of such tobacco, but on quantities in excess of 22 million pounds in any year, the duty is 28¢ per pound. By this means the United States protects a few domestic growers and the Puerto Rican producers of cigar leaf tobacco.

Among the various types of quotas, the tariff quota probably has the longest history. By the middle of the nineteenth century several European countries had employed the device to encourage small but fixed amounts of frontier trade at a rate of duty lower than the general tariff. Subsequently, the tariff quota was inserted in trade treaties in order to encourage the importation of specified products from neighboring or other countries. During the past several decades, however, fixed import quotas have tended to replace tariff quotas in most countries.

#### The Unilateral Import Quota

(The quantitative restriction of trade, which takes the form of an absolute limit on the importation of a commodity during any one period imposed by or through governments without prior negotiation with foreign governments, is called the *unilateral* (or autonomous) import quota. Such a fixed quota may be a *global* quota, in which case the commodity may be

imported from any country up to the amount of the quota, or it may be an *allocated* quota, in which case the total of the quota is divided, in advance, as between specified supplying countries or as between specified home importers.)

The global quota, although being the earliest of the unilateral import quotas to find wide use, has proved unsatisfactory in most cases. Since under this type of restriction neither the percentage of the total quota that may originate in different supplying countries nor the amount importable by individual national importers are specified, there results a competitive rush to fill the quota. Importers and foreign exporters hasten to take advantage of the situation. One result is that suppliers in distant countries are placed at a disadvantage as compared with suppliers located in countries adjacent to the importing country. This disadvantage, involving unintentional discrimination, is particularly marked in continental Europe. A second result is that large importing firms, which are able to order a large quantity on short notice because of trade connections and the relative ease of obtaining credit, are placed at a decided advantage as compared with small importers. Third, the rush to get commodities into the quota country may result in periodically oversupplying the market, especially in perishable goods. Prices, therefore, may be subject to greater fluctuations than would be the case in the absence of the quota. Finally, since the mad rush to get in before the quota is filled often results in imports in excess of the permissible limit, costs are increased all round, monetary penalties are imposed and storage costs are incurred, and even reshipment to the country of origin may be involved. Global quotas, therefore, may be criticized as involving: first, actual discrimination, though of course unintentional, against both distant countries and small traders at home, and second, increased uncertainty for all parties involved. There is in addition the monopoly problem, which will be discussed later when we consider the effects of quotas on prices.

Prewar European experience showed that the introduction

of the allocated quota was generally a reaction to unsatisfactory experience under the global quota, but there were other reasons for introducing the allocated quota. Some countries deliberately wished to discriminate in favor of particular foreign countries, and for this purpose imposed quotas allocated as between countries. Often the quota country was more desirous of favoring a country that was a market for its exports than of restricting imports per se. The mere imposition of an allocated quota by an important importing country may provide it with a valuable bargaining weapon. British quotas on meat and dairy products, for example, severely limited the freedom of action, in commercial policy matters, of such countries as Argentina and Denmark. In order to avoid evasion of country quotas by importation through third countries. however, the allocated quota generally included strict regulations relating to the national origin of imports. Another reason for restricting imports on an allocated quota basis was the desire of the quota country to retaliate against countries that had been treating their trade unfairly. Such retaliation took the form of according the offending countries small proportionate shares of the quota.

Allocated quotas generally involved considerable difficulties of an economic and administrative sort. Except where a policy of discriminatory treatment was being followed, the allocated quota was usually based on the percentage contribution of supplying nations in some preceding (base) period. This involved the application of what is called the representative period formula. But the demand for a particular nation's product varies from year to year. A given country's exports often are dependent on the vagaries of the weather; costs and prices also vary with time. The use of any single year as a base period, therefore, tends to favor some countries and to be unfair to others. This inherent difficulty, it may be added, appears in intensified form if, as often happens, the export statistics of some countries include goods originating in other countries and, therefore, passing through it only in transit.

A second shortcoming of the allocated quota was that it made possible monopoly-like action among the exporters who were assured of a definite share of the quota. In order to offset such action, importing countries on occasions shifted temporarily from an allocated to a global quota basis, and thus permitted outsiders to compete with previously favored suppliers. This insured that the benefit of higher prices in the quota country redounded to importers and not to foreign suppliers.

## The Licensing of Imports

(Import licensing was introduced in many instances as a means of meeting the objections to the global quota, and in some instances for other purposes. Apart from the use of licenses in cases where the size of quotas was not revealed publicly (licensing being necessary to avoid speculative excesses), a licensing system prevented the rush to import, which, as we have seen, was a characteristic disadvantage of the global quota. In addition, licensing improved the control machinery by making available more systematic information concerning importers. Licensing systems attempted to accord equality of treatment to different importers, mainly on the basis of each firm's business in a previous representative period) In this case, as in that of the allocated quota, however, the use of a single base year worked an injustice upon many individual importers; in fact, since in any one past period the situations among numerous importers are generally more varied than is true in the case of individual commodities, the problem of the base year invariably plagued licensing officials. (The licensing systems also sought to establish a set of rules according to which licenses are granted, but as a rigid licensing system generally evoked excessive criticism from trading and other interests, countries attempted to adopt flexible bases for the distribution of licenses.) Flexible criteria, however, met one set of criticisms only to create another. Particularly difficult were the problems arising out of seasonal fluctuations with respect to individual commodities, the changing conditions of supply in different supplying countries, and the consideration of the demands of new importing firms.

We may illustrate the nature of these problems by considering the case of new importing firms. New firms generally represent themselves as in some sense more efficient than existing ones. Under a quota regime, however, the addition to the list of firms obtaining licenses simply reduces the share of the quota granted existing licensees. But the inclusion of new firms will not serve to reduce the prices of imported goods, since the total quantity remains unchanged. As a result, increased efficiency on the part of new firms simply increases their profits. To be sure, such profits could be siphoned off into the public treasury if licenses were put up for sale to the highest bidder, but prices to the public would still remain at the previous level.

Nevertheless, the prewar system of import licenses, like the allocated quota, represented a decided improvement upon the global quota. The scramble to import before the quota is filled, the excessive fluctuations in prices caused thereby, and the favoring of large firms, were reduced or eliminated. In addition, excessive profits could be taxed away by the auctioning of licenses, thus bestowing indirect benefits on consumers.

Apart from the use of the licensing technique to correct some of the shortcomings of the global quota, the system of import licensing was frequently used for other purposes. Two concrete cases illustrate some of these other uses. Determined to effect a diversion of trade, Australia in 1935 managed virtually to exclude Japanese textiles in order to restore the market to British suppliers, to make the Empire preferential tariff effective, so to speak. The weapon used was that of licensing all textile imports, excluding those of Japanese origin by the simple device of denying a license. Similarly, during most of 1944 the Mexican government used American wartime export licensing as a substitute for straightforward import licensing on its own part. Desirous of according its wardeveloped domestic steel industry a degree of protection substantially exceeding that obtained from its tariff, Mexico

insisted that the United States Foreign Economic Administration make the granting of export licenses for many types of steel conditional upon prior clearance with the Mexican Imports Co-ordination Committee in Mexico City. In all cases in which Mexican steel companies were able to fill the order, the Mexicans failed to grant clearance, and as a result the application for a United States export license was denied. In November, 1944, however, the United States resumed licensing for export without submitting to prior clearance with Mexico. The American authorities clearly recognized that United States export control was being used as an instrument of foreign import control. The latter was an end alien to the purpose for which American export licensing had been established

.Mexico also claimed that prior import clearance in connection with American export control was the simplest means of operating its own control over the prices of imported goods, but this objective was subordinate to the end of protecting domestic industry. That protection was the real objective is shown by Mexico's refusal to clear applications licensing the foreign export of "surplus" American steel plate in mid-1944 on the ground that importation of such products meant that a new Mexican plant shortly to be completed would be left without orders. In explanation of the timing of American action to eliminate prior import clearance, it may be remarked that preparations were being made to place steel on general license in view of reduced war needs for steel. Under general license American export control would not exercise selective treatment of individual shipments, so that Mexico would then have to rely entirely upon her own devices if American steel was to be kept out of her market.

# The Bilateral Quota

European experience with import quotas showed, as was indicated in part earlier in this chapter, that foreign producers are likely to take monopoly-like action as soon as a definite

quota has been assigned to their country. Such monopolistic exploitation was often combatted by the device of shifting temporarily from an allocated to a global quota-that is, by opening the door to permit the entrance of the fresh air of competition among suppliers. In other instances, however, (importing countries negotiated quotas with foreign producers. and allowed the administration of licensing to be handled by the exporting country. Because such quotas were the result of negotiation between the importing country and the exporting country (or foreign export groups), they have been called bilateral quotas.) The advantages claimed for the bilateral quota as compared with the unilateral type are (1) that foreign governments or export groups have a greater interest in preventing imports from exceeding the (global) quota, (2) that provision can be made to have exports spread evenly over the quota period, thus avoiding excessive fluctuations in imported supplies. (3) that export monopolies can be excluded by agreement, (4) that participation by foreigners in the administration of licensing tends to reduce their opposition to the imposition of quotas, and (5) that licensing by the exporting country eliminates the difficulties associated with appeals and pressures coming from importers in the quota country.

The principal objection to the bilateral quota was that it tended to fall into the clutches of existing international cartels. The very existence of cartels for the purpose of dividing international markets, plus the fact that the administration of export licensing under the bilateral quota is often entrusted to private organizations, such as chambers of commerce, made the quota arrangement easy prey for well-organized cartels. In the second place, because the bilateral quota usually resulted in raising prices in the export country whenever there was foreign administration of the quota, importers as a class stood to lose. The national treasury also lost, since profits on import transactions were transferred from domestic to foreign firms and were thus excluded from the tax base.

# The Mixing Quota

Among the increasing number of nominally domestic measures that had a serious impact on international trade, one of the most important was the type of regulation that limited the proportion of foreign-produced raw material that could be incorporated in domestically finished products. Many of these measures are still operative. Thus, Brazil requires that a certain percentage of the weight of bread must consist of domestic mandioca flour, whereas Great Britain requires the use of a minimum of domestic wheat flour in all bread. The same type of restriction applies to a long list of products, including textile fibers (raw wool and synthetic fibers), liquid fuel (natural gasoline and alcohol), beverages (coffee and chicory), tobacco (domestic and foreign leaf), and rubber (natural and synthetic). Except for the case in which the mixing quota is designed to relieve a country of complete dependence upon a foreign monopoly-a consideration, incidentally, that will be important in connection with American postwar policy on rubber—these mixing regulations clearly thwart the aim of distributing resources according to the principle of comparative advantage. The result is that prices are generally higher than they should be, and there is a considerable deterioration in the quality of the products involved.

### The Effects of Quotas on Prices and Trade

(The effects of quotas of different types vary according to (1) the character of the market for particular products and (2) the degree of competition between importers on the one hand and between exporters on the other. In other words, it must be asked whether the country having the import quota consumes a large or a small share of the world supply of the restricted commodity, and also whether the commodity protected by the quota is produced (or imported) by a monopoly or by a number of competitors.)

Quota effects will here be discussed upon the simple assumptions that the commodity is traded under competitive condi-

tions and is produced exclusively in the exporting country. Three cases will be contrasted: (1) no obstruction to imports, (2) a fixed quota, and (3) a tariff quota that incorporates an ad valorem duty. We shall concentrate our attention on the importing nation's market.

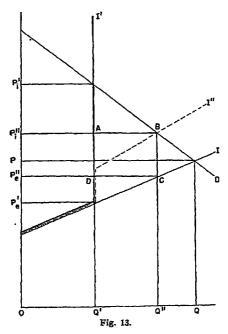


Figure 13 shows the domestic demand (D) and the supply of imports (I). The import supply commences at what would be the equilibrium price in the exporting region if it were in isolation. At higher prices supply abroad exceeds demand abroad, and a surplus becomes available for importation into the country we are considering. As long as we are aware of

these relationships there is no need to add the exporting nation's schedules to the left side of the diagram.

- 1. If there were no obstruction to imports, the equilibrium price in the importing and exporting markets would be OP, and an amount represented by OQ would be traded internationally.
- 2. The importing nation might impose a fixed quota of OQ' units. In this case the relevant import-supply schedule becomes I' because supply in excess of the quota limit is now perfectly inelastic. The result may appear somewhat anomalous at first glance because the domestic buyers are willing to pay  $OP'_{\iota}$  and the foreign suppliers are willing to accept as low as  $OP'_{\iota}$  for the same quantity. This considerable disparity normally goes into the pockets of those persons who have secured import licenses from the quota authority.

Such a result is hardly satisfactory. License holders are seldom deserving of the special privileges bestowed in this way by the government. Also, because of the great value of the license, applicants are tempted to bribe officials in more or less refined ways. Accordingly, it has been suggested that governments should sell quota licenses at auction to the highest bidder. The state then benefits from the profit opportunities which it has itself created, corruption of officials is rendered less likely, and competition amongst new and old importing houses is not suppressed.

An innovation of this kind would give the effect of a duty that varies automatically from period to period as demand or supply schedules shift, but in such a way that a constant quantity is always imported. A reduction in the reservation prices of foreign exporters would, accordingly, fail to benefit domestic buyers, although it would increase the government's receipts. The price paid by domestic buyers will change only if the local demand schedule shifts.

3. A tariff quota constitutes an intermediate case. Let us suppose that there is a duty-free quota of OQ' units, above which a 33 per cent ad valorem duty is imposed, with valua-

tion for customs purposes being based on the foreign supply price. The significant import supply schedule now becomes I''. (By construction, I'' is 33 per cent higher than I for all quantities in excess of OQ'.) The equilibrium quantity now becomes OQ'', the domestic price becomes OP'', and the foreign supply price becomes OP''. The local government collects customs duties totalling ABCD. Import license holders receive an unearned profit, unless they have had to pass some of this on in the form of entertainment, and so on, of P'', ADP''. Here again there is a real question as to whether the local government should not auction off its import licenses while retaining a fixed duty rate on the balance of the imported supply.

(In general, both tariffs and quotas are restrictive, and, consequently, they cause many common effects. The volume of international trade is reduced. A price disparity is created amongst the various markets, with price rises in the importing nations and price drops in the exporting ones. Higher domestic prices stimulate production and discourage consumption at home; lower foreign prices discourage production and stimulate consumption abroad. There is a strong presumption that the allocation of resources has been rendered less

efficient.)

#### Summary

Quotas are of several different types. The tariff quota, which combines the quota and the tariff, is the least restrictive of the leading types of import quotas. This kind of import quota does not constitute an absolute bar to importation, since the importer is free to import unlimited amounts provided only that he pays the higher rate of duty on imports in excess of the quota. The unilateral import quota does constitute an absolute bar to importation over and above the size of the quota. Greater protection is thus afforded domestic producers under this type of quota. The global form, moreover, involves discrimination in trade and frequently leads to waste-

ful movements of goods, especially when perishable commodities arrive at the border shortly after the quota has been filled.

In order to minimize the discrimination and to prevent the rush to fill the quota, countries introduced the allocated quota. Two difficulties are involved when this type of device is used:

(1) the base period used for making allocations cannot be

(1) the base period used for making allocations cannot be decided to every person's satisfaction and (2) the quota tends to make for monopoly-like action on the part of foreign suppliers who are thus assured of a market of given size. It is to meet difficulties of this sort, that nations have invoked the device of import licensing; but licensing involves difficulties of its own, particularly in regard to the unfair treatment of new firms when licenses are issued on the basis of transactions during some past year.

The bilateral quota, which is the product of negotiation between the importing country and a foreign country or foreign suppliers. meets some of the above objections. Its chief weakness, however, is that the quota tends to fall into the clutches of international cartels.

Finally, we considered the mixing quota. This restriction is very protective in effect, and it generally results in quality deterioration as well as high prices.

With respect to the effects of quotas on prices and trade, we traced the effects as illustrated by the cases of fixed and tariff quotas. Under conditions of competition in both the exporting and importing country, we found that the price effects of a quota are about the same as the price effects of an ordinary tariff, provided that the spread between the prices in the two countries exceeds the spread between the quota duty and the regular (higher) tariff. We also noted that where protection comes from a quota rather than a tariff, the ensuing disparity between export and import prices redounds to the benefit of private traders rather than to the restricting government.

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# Chapter 17

# Trade Control: Exchange Control

NDER a regime of unrestricted operations in foreign exchange, the citizens of a country are free to buy or sell the currencies (or claims thereto) of any country without having to submit to any limitations or red tape whatsoever. When, and only when, restrictions are placed upon the buying (acquisition) or selling (disposal) of foreign currencies is it proper to say that a country's machinery of foreign payment is subject to exchange control. The intervention in the market of a central institution, say for the purpose of stabilizing a particular exchange rate, does not constitute exchange control if foreign traders and exchange speculators are free to acquire or sell foreign bank balances at the stabilized rate of exchange. In terms of common wartime controls with which all are familiar, it may be helpful to compare the exchangestabilizing mechanism to commodity price control proper, and exchange control to commodity rationing.

(Exchange control, then, may be defined as a system in which the government intervenes to require a special disposition of foreign balances accruing to its nationals or to allocate, by means of special criteria, the foreign funds needed by its nationals to effect various foreign payments, or to do both.) Let us illustrate. A country may require its exporters (and its investors, and so on) to deliver to an agency of the government all foreign exchange (that is, claims on foreign banks) accruing to them, against payment in home currency at one or more exchange rates, without restricting, however, the ability of its nationals to obtain funds from official sources for transfer to

foreign countries. Or the country may require the surrender of all foreign exchange to the government agency and also empower that agency to allocate such exchange in special ways to individuals having to make foreign payments. The latter is the most common type of exchange control.) Each of the two general types may be found with many variants. Thus, one variant of the first type would be the requirement that exporters and others acquiring claims to a particular foreign currency must surrender that currency to the government agency, leaving holders of all other currencies free to dispose of them without restriction. A second variant would call for the surrender of, let us say, two foreign currencies, one at a rate different from the immediately preceding free-market rate and the other at the free-market level, with all other currencies freely disposable in the market. Similarly, variants of the second type of exchange control might differ in terms of the exchange rates at which particular currencies are required to be surrendered, the exchange rates at which the foreign value of particular export commodities is converted into local currency, or the exchange rates at which particular categories of foreign payments may be made. Each of these variants has occurred in the exchange-control systems of various countries. Many more complicated variants may also be found among the exchange-control systems that have cropped up in recent years. But upon analysis, all of the variants will be found to involve either or both of the following: (1) in the case of exporters and those having claims on foreigners, there may be several (buying) exchange rates for the same foreign currency, depending upon the commodity or type of transaction involved and (2) in the case of importers and those having foreign payments to make, there may be (a) several (selling) exchange rates for the different commodities or transactions involved or (b) prohibitions against payment for specified categories of goods or transactions.)

How, it may be asked, is it possible to charge several prices (exchange rates) for the same thing or to buy the same cur-

rency at several exchange rates? The answer is that the control agency operates as a monopolist, a discriminating monopolist, so to speak. All the coercive weapons of the state are at the disposal of the control. The customs service is used to an important extent, especially to assure that goods, concerning which exchange-control provisions have not been met, do not receive customs clearance, either as exports or imports. Such goods are either confiscated or held in storage indefinitely at considerable cost to the owners. Or, in the case of financial transactions, the control inspects the books of companies, requires detailed reports, and may even impose various forms of censorship over communications. Penalties for violations usually are severe.

# Mechanisms of Exchange Control

Within the broad field of exchange control several mechanisms are clearly distinguishable. The following will be discussed: (1) compensation arrangements, (2) clearing agreements, (3) payments agreements, and (4) exchange control without special intercountry agreements, or briefly, unilateral nondiscriminatory exchange control. These several mechanisms are not mutually exclusive; they are, in fact, frequently used in combination.

Compensation Arrangements. This type of arrangement is the nearest thing to the old-fashioned barter deal that is to be found under exchange control. The arrangement consists, at bottom, of matching deals between parties in two different countries with equivalent value being involved on both sides. An example would be the sale of X marks of industrial chemicals by a German firm to Brazil, the Brazilian importer agreeing to supply the same X marks (calculated at a mutually agreed exchange rate) worth of raw materials to Germany. Imports thus compensate for exports, leaving no balance requiring settlement in foreign exchange. Such arrangements, which were entered into in order to create trade which otherwise would not have taken place, have practically all of the

shortcomings of regular barter, which explains why compensation arrangements have been comparatively unimportant.

Clearing Agreements. Among the several exchange-control mechanisms, clearing agreements stand out prominently. A clearing agreement may be defined as an undertaking by two countries (though it is possible for several countries to be parties) to buy and sell goods and services to each other in terms of specified exchange rates, against payment by buyers entirely in the buyers' home currency, with the balance of claims being subject to settlement as between central banks at the end-of-stipulated periods. The exchange rates must be specified if the buyer is to know what the foreign price amounts to in his home currency. When the exchange rate is given, the transaction as far as the buyers are concerned, becomes virtually identical with any other purely domestic transaction. An illustration will help to make this clear. Suppose Switzerland and Germany have a clearing agreement, that the Swiss franc is valued at 2 marks for clearing purposes, and that X in Switzerland buys 1,000 marks of goods from Y in Germany. Under the agreement, X simply pays 500 Swiss francs to the Swiss National Bank (the central bank), the latter placing the sum to the credit of the German Reichsbank (the central bank). In Germany the purchase by A of 1,000 Swiss-francs worth of Swiss goods would require that A pay 2,000 marks to the Reichsbank in settlement of the transaction. The result. therefore, is that individual transactions between these two countries are settled entirely in local currency. At the end of the clearing period, say a year, a balance would be struck. This balance would be settled as between the two central banks by payment in terms of gold or an acceptable third currency, such as dollars, or the balance might be allowed to accumulate for another period, pending an arrangement whereby the country holding a credit balance could work off this balance by extra purchases from the other clearing country. Such, in brief, are the mechanics of a clearing agreement.

The mechanism admittedly has an engaging simplicity.

The exchange rate generally is known in advance and is fixed for a specified period. Payment may be made in one's own currency simply by drawing a check in favor of one's own central bank. There are, however, serious disadvantages in connection with clearing agreements, as will be indicated later in this chapter.

Payments Agreements. A payments agreement may be characterized as an arrangement to obtain payment reciprocity without altering the usual procedure of making foreign payments. It is another of the "you-scratch-my-back-I'll-scratchyours" type of arrangements which were developed during the interwar period. It differs in form from a clearing agreement, but need not and often does not differ in effect from them. If Country X usually buys from Y much more than Y buys from X, the latter may at first try to persuade Y to "buy from those who buy from you." If such an approach does not work, X may inform Y that continued purchases by X can be expected only if Y "does something" to equalize payments in both directions. Y may thereupon agree to establish a method of control whereby its citizens are forced to buy goods and services from X in an amount equal to X's purchases from them. By substituting Britain for X and Argentina for Y, the reader obtains an idea of the antecedents and character of a typical payments agreement, the Anglo-Argentine agreement of 1933. Under this agreement as under other payments agreements, Englishmen having payments to make in Argentina and Argentines having payments to make in Britain purchase foreign exchange in the market in the usual, traditional way. In this sense the payments agreement obviously differs from the clearing agreement.

Another type of payments agreement is one designed to collect past-due debt. Thus, Britain and Germany agreed in 1934 to set aside 55 per cent of the value of German current exports to Britain for the payment of creditors in the United Kingdom, the other 45 per cent being free with minor exceptions for use at the discretion of the Germans. This type of

agreement has protective effects in the debtor country, since it tends to restrict merchandise imports from the creditor.

It is sometimes stated that a payments agreement differs from a clearing agreement in that the former is between an exchange-control country and a nonexchange-control country, whereas a clearing agreement is one between two exchangecontrol countries. This distinction is useless for analytical purposes and incorrect historically. During the 1930's Switzerland, a nonexchange-control country, was a signatory to several clearing agreements. And cases in which accumulated credits were settled, under clearing agreements, by payments in gold or free (that is, nonexchange-control) currencies, differed only in form from the payments-agreement type. The latter does not require the exact balancing of reciprocal claims per unit period, but only an endeavor on the part of the country with the usual export surplus to reduce the surplus by way of increased purchases of goods and services from (or increased financial remittances to) the other (import-surplus) country. There are even cases on record in which exchangecontrol countries have carried out payments agreements in such a way as to convert a traditional excess of receipts from a given country into an excess of payments to that country. This has been done by discriminating against the trade of third countries, usually the United States. What really is of central importance in the case of both clearing and payments agreements is their use as an instrument to bilateralize trade. to force it in a particular direction at the expense of third countries. Viewed in this light, there is little formal difference in the potential danger of the two weapons, although the menace of clearing agreements is no doubt greater mainly because the creditor does not have control over his claims in the sense that obtains in the case of credits under a payments agreement.

Unilateral and Nondiscriminatory Exchange Control. This type of exchange control is characterized by the fact that it is not based on international agreements with respect to the

allocation of available foreign exchange and that the allocation of exchange is internationally nondiscriminatory Its major purpose is to maintain parity of exchange or to prevent a further depreciation of the currency. The procedure is to ration exchange, without formal discrimination as between countries, to the end that the most essential imports of goods and services obtain priority of treatment or preferential treatment on a price basis. Clearly, this procedure provides protection to domestic firms producing goods competitive with less essential imports. Its secondary purpose may be the preferential treatment of certain export products or exporting firms. These features are by no means unique to this type of exchange control. They are, however, of major importance. in contrast to the types of exchange control that have as their principal aim the implementation of international (bilateral) agreements, formal and informal. Or to put it differently, unilateral exchange control discriminates as between commodities and services without regard to national origin (luxuries and purely financial transfers are placed at the bottom of the list of categories for which exchange is made available), whereas the type of exchange control that implements international agreements is generally discriminatory as between countries instead of as between commodities. Unilateral control does not bilateralize trade, whereas the other type does. Clearly, the unilateral type, because it is nondiscriminatory or virtually so, breeds less international controversy and is a much more tolerable form of restriction on international trade.

Chilean exchange control during the late 1930's illustrates the unilateral type under discussion, though it is of the hybrid variety. Except for clearing agreements with Germany and Brazil, which involved a relatively small part of Chile's trade, Chile received uncontrolled currencies (mainly dollars) for its exports. The control authorities discriminated as between imported goods and services solely on a commodity or service basis, by allocating foreign exchange at three separate rates—19.37, 25, and 31 pesos to the dollar. In other words, for some

goods and services the Chilean peso was worth 5.16¢, whereas for other goods and services it was worth 4 cents or as little as 3.2¢—the first-mentioned rate being 60 per cent higher (more advantageous) than the last rate.

The unilateral type of control is seldom found in pure form, but is usually a hybrid with one or more clearing agreements also involved. In the hybrid state clearing agreements may become so important relatively that the controls become primarily of the clearing-agreements type. It follows that the bulk of the available exchange must not be tied up in (nontransferable) clearing credits if the unilateral type of exchange control is to remain what its name implies. It may be stated, therefore, that a necessary condition for the nondiscriminatory rationing of exchange is that the country in question must do business mainly with countries in which foreign payments are made without strings attached, or in other words, with genuinely free-exchange countries. During the 1930's the United States was one of the few countries in this category. In one form or another, most other countries not practicing formal exchange control frequently required that payments to a particular foreign country be used by the receiving country in buying goods and services from the paying country. That is, most other countries practiced bilateralism in one form or another. The fact that nondiscriminatory exchange rationing requires that a country's trade be mainly with genuinely freeexchange countries explains why such exchange rationing was confined to relatively few countries, most of which were in Latin America.

It has been proposed by responsible writers that agricultural countries in need of diversifying their economies should make use of nondiscriminatory exchange control until they have achieved balanced economies. Such countries need capital goods and the technical skills of the older, industrialized nations. Because of the high propensity to import, however, the

<sup>&</sup>lt;sup>1</sup> See, for example, Hansen, A. H., America's Role in the World Economy, p 186 New York: W. W. Norton Co., 1945

agricultural countries tend to dissipate the proceeds of their exports on luxury imports. And when such countries are faced with important crop failures or depression in major foreign markets, there is no means of conserving vital foreign exchange resources. There is something to be said for this view but such an approach may also increase the tendency of weak nations to succumb to the pressure that is often placed upon them by some large countries seeking trade favors. An exchange-control system of the sort envisaged may easily degenerate into the discriminatory type of control. A far simpler and safer procedure would be to have the agricultural countries in question impose temporarily (1) very heavy import duties on luxury imports and (2) similarly heavy excise taxes on domestic products comparable to luxury imports. If such duties and excises are high enough, it will be easy to check the propensity to import and consume luxury goods.

# Objectives of Exchange Control

Although exchange control is a type of apparatus that is flexible enough to permit the attainment of a wide range of goals, there are only a few general objectives of such control. These general objectives may be listed as (1) maintenance of exchange-rate parity, (2) use of exchange control as a source of revenue, (3) attainment of discriminatory bilateralism in trade, and (4) self-sufficiency and military preparedness.

The Maintenance of Exchange-Rate Parity. With the collapse of international lending and raw material prices in 1929-30, a number of countries found themselves exposed to unexpectedly sharp disturbances in their balance of payments. The main result was a stampede to transfer wealth into currencies felt to be more stable, such as the dollar. In some countries the exchange rate was allowed to fall in sympathy with this flight of capital by the familiar process of depreciation of the currency. In many others, however, depreciation was associated in the popular mind with the dreaded spectre of runaway inflation of the type that was experienced in Europe

after World War I. Many countries, therefore, proceeded to carry out a policy in which the maintenance of exchange parity was a cardinal objective. With few exceptions the countries that insisted on the maintenance of parity were central European. These countries used exchange control at first chiefly for the purpose of checking the flight of capital, but industry also obtained protection in the process because foreign suppliers often refused to ship goods to the exchange-control country for fear of not receiving payment.

Why was not a policy of exchange depreciation adopted instead of exchange control? The answer is that exchange depreciation is an effective alternative to exchange control if the purpose is to remedy a persistent deficit in the balance of payments on current account. But if the difficulty is mainly one of a flight of capital occasioned by a sudden contraction in the flow of foreign credits to the country in question, depreciation of the currency may only serve to intensify the rush to convert home currency into foreign currencies. That is, to the demand for foreign currency arising from a fear of depreciation is added an additional demand to "get into a safe currency" before the home currency, which has just been depreciated X per cent, suffers a further reduction in exchange value.

There is, however, one important qualification to this statement: it is that a drastic depreciation in one fell swoop, which quickly becomes accepted by the citizenry as sufficiently great to counteract the original change in the balance of payments, is likely to remove the incentive to rush the transfer of balances into another currency. Moreover, an impending or existing capital flight, which seems to be combatable only by the imposition of exchange control, is hardly going to be measurably affected by such conventional devices as central-bank discount policy or debt moratoria. (Funds will not be transferred to a foreign country that is in difficulty in order to earn an additional one or two per cent as interest if there is a serious risk of a big loss of, say, 10 per cent of principal, as often results when a currency is depreciated. Moratoria on foreign debts

generally provoke the flight to safer foreign centers of masses of domestic funds.)

What are the chances that a system of exchange control, imposed only to check a flight of capital (that is, control confined solely to capital movements), will actually remain limited to the narrow sector of the capital account? The chances would be good if the countries threatened by large-scale flight of capital were able to obtain, without delay, such co-operation from foreign prospective-capital-receiving countries as would effectively prevent the receipt of funds from capital-losing countries. No such experience is a matter of record, however, nor does it appear likely that such co-operation could be had from countries wishing to preserve an uncontrolled exchange market. In other words, the probable capital-receiving countries would have to institute exchange control on their own part if they hoped to be able to isolate funds entering directly or indirectly from the capital-losing country.

If, however, it is impossible to obtain effective co-operation of the sort just mentioned, the answer to the question depends mainly on the extent to which individuals in the prospective capital-losing country are determined to export their capital. Should their determination be very great, prohibitions against specific types of (typical capital-flight) transactions will be evaded, and purely financial transfers will be engineered by roundabout methods. For example, exporters will deliberately undervalue their shipments, leaving abroad the difference between the stated value and the price actually received from the foreign buyer. As a result, it will be necessary to extend exchange control to all foreign payments—that is, to current-account as well as to capital-account transactions. It may not be possible to control capital flight on the principle of limited liability.

Exchange Control as a Source of Revenue. A number of countries have used exchange control as a source of government revenue, particularly as a supplement to or substitute for ex-

port duties.2 Essentially simple means are employed to obtain revenue from exchange control. The means generally consist of forcing all or specified exporters (of export products) to sell foreign exchange (dollars, sterling, and so on) to the control authorities at a price substantially below that at which the same foreign exchange is sold to the public. From the point of view of the exchange-control authorities, the difference or spread between these rates is simply a magnification of the usual margin obtained by the banks in all countries when, as dealers, they buy and sell foreign exchange. That is, the price at which exporters are forced to sell their foreign exchange to the control is the control's buying rate of exchange, whereas the price at which the control sells exchange to the public is the control's selling rate of exchange. The spread between these two rates, or the exchange margin, seldom exceeds a small fraction of one per cent in the case of commercial banks operating as dealers in an uncontrolled market.

In the case of exchange control, the margin which accrues to the control authorities usually is large, 25 per cent or more, Thus, the principal copper companies in Chile must sell dollars received from the export of copper, to the extent required to obtain pesos for local costs in Chile, at an exchange (buying) rate of 19.37 pesos to the dollar or about five cents per peso. The Chilean authorities sell these dollars to the public at a different (selling) exchange rate, 31 pesos per dollar, which amounts to just over three cents per peso. The exchange margin in this instance works out at 11.63 pesos per dollar, or approximately 37.5 per cent of the selling exchange rate. (If the reader is troubled by the control's buying at a five-cent peso and selling at the equivalent of a three-cent peso, he can quickly be straightened out if he thinks of the wholesale and retail prices of, say, potatoes in the same terms. The reader can see for himself that a penny's worth of potatoes at the

<sup>&</sup>lt;sup>2</sup> It may be pointed out that the United States Constitution forbids the use of export duties.

wholesale price always equals a heavier weight of that commodity than a penny's worth at retail. The difference of course represents the retailer's margin.)

The Chilean example shows clearly that the exchange margin is simply an export tax in a different form. If the exported copper had been valued, f.o.b. Chilean ports, at the selling rate of exchange of 31 pesos per dollar and then had been made subject to an export tax of approximately 37.5 per cent, the copper exporters would have shown the same results in terms of costs and profits. It may be stated as a general rule, therefore, that an exchange margin is the same in purpose and incidence as an equivalent export tax. In terms of practical politics, however, it may be extremely difficult in some countries to impose a heavy export tax, particularly if the principal export commodities are produced by home-owned industries. In such cases the use of exchange control to create a sizable differential between the buying and selling exchange rates, although nominally applicable to all or most export products, may actually represent the simplest practicable means of levying a given tax burden on the industry best able to bear taxes.

Discriminatory Bilateralism. Exchange control has been carried out in a number of instances for the purpose of favoring trade with and payments to particular countries, such favoritism consisting of (a) special exchange rates or (b) priority of treatment on a uniform exchange-rate basis. This type of exchange control is appropriately labeled discriminatory bilateralism, the adjective discriminatory being used for the sake of emphasis. Bilateralism in any form, however, is essentially discriminatory. Thus, British Empire tariff preference, French import quotas, or United States-Cuḥan reciprocal customs preference—all involve discrimination in trade on a country basis. Moreover, intercountry discrimination need not involve formal government action: it may be practiced very quietly in cases of semimonopoly by a foreign-owned railway system's refusal even to consider placing an order

for equipment with a supplier residing elsewhere than in the ownership country. Or intercountry discrimination may be practiced by the foreign subsidiary doing business exclusively with the parent concern even if the same goods are available at lower prices in another country; or the discrimination may be by the action of foreign advisers to the government of relatively backward countries in recommending that orders be placed with suppliers in the adviser's own country. But this is not the place to attempt an exhaustive treatment of the concept of discrimination in international trade. Suffice it to emphasize the type of discrimination inherent in a bilateralist type of exchange control.

Two classes of bilateralist exchange control may be distinguished, each based on the nature of the control mechanism employed by the regulating country. Clearing-agreement bilateralism is one class, and the other class may be called payments-agreement bilateralism. Under the clearing-agreement type of bilateralism, a two-way balancing of accounts does not result merely as a mechanical consequence of the working of the clearing apparatus. If, for example, the clearing-exchange rate is out of line with the price-income relationship obtaining in the two countries, one country will accumulate clearing credits. If the country having the credit in the clearing has little bargaining power with the other clearing partner, it will in all likelihood be compelled to accept a continuation of the exchange rate overvaluing the partner's currency, and, therefore, find it necessary to divert imports of goods and services from other (more economical) sources to. the clearing partner. Otherwise, the clearing creditor would find itself extending credit involuntarily to the other clearing partner. To illustrate, Germany skillfully employed some of its clearing agreements to create large mark clearing credits in Berlin to the account of southeastern Europe clearing partners whose bargaining strength vis-à-vis Germany was weak. The Berlin clearing credits represented involuntary loans extended to Germany. (It has euphemistically been said that this practice represented "lending in the borrower's currency".) Not only were such loans involuntary; they were made by capital-poor countries commonly faced with concealed unemployment (that is, an excessive and idle farm population) traceable mainly to a lack of capital. The operation of these clearing agreements served, therefore, to intensify an existing vicious circle in the life of a relatively backward area.

If something approaching equal bargaining strength obtains. on the other hand, the tendency to discriminatory bilateralism. in the form of a forced diversion of trade to the clearing partner, is considerably reduced. In such circumstances the country with the clearing credit can take steps to rectify the situation by doing any one or a combination of three things. First. reduce its exports to the other country and work off the credit by continuing imports at an unreduced level. Secondly, insist upon payment of the credit in gold or free exchange. Thirdly, insist upon corrective adjustments in the exchange rate or in prices themselves. Such, then, are the steps that can be taken by a clearing creditor possessing bargaining strength. It must be said, however, that it is unlikely that a country with great bargaining strength will actually find it necessary to enter into a clearing agreement except on terms favorable to itself. The logic of the case as well as experience to date (contrast the cases of the United States and the United Kingdom) bear this out.

Even where the cardinal objective is revenue, however, exchange control usually has important protective effects. The reason for this is that foreign exchange generally is not available to all demanders without restriction. As a rule, importers applying for exchange to effect imports of so-called less essential commodities are either denied exchange or forced to wait a long time to arrange payment. Domestic industries thus obtain protection that is equivalent to a prohibitive tariff if exchange is denied for particular merchandise, or they obtain moderate protection if the exchange authorities merely delay the granting of exchange permits. It is only when a revenue-

type exchange control grants exchange without restriction for virtually all current-account transactions that the system is devoid of protective effects.

Payments-agreement bilateralism differs only in form from the clearing type. Instead of payments by importers being made directly in local currency to the clearing office, foreign payments under a payments agreement typically are made through the regular foreign-exchange market. If the payments agreement is designed to bilateralize trade and payments, one of the countries to the agreement commits itself to divert trade, by means of its exchange-control apparatus. from the channels it would otherwise follow until there is an actual or approximate two-way balancing of payments between the two countries. The diversion of trade may take a number of forms. Contracts for government projects of all kinds may be let preferentially to the favored foreign country. Special terms may be offered the favored country for transferring profits earned by its nationals in the exchange-control country. Or licenses to import goods may be granted for the express purpose of favoring suppliers located in a particular foreign country. The history of Anglo-Argentine trade relations since 1931 illustrates very clearly how payments-agreement bilateralism achieves each of the three general forms of trade diversion just mentioned. Argentina, as a matter of policy, favored British contractors bidding on government projects. The Argentine authorities granted British-owned railways especially favorable exchange rates for remitting profits to London offices; and Argentina diverted trade to Britain on a large scale, first by such devices as the levying of heavy exchange surcharges (taxes) on transfers of funds to suppliers in countries such as the United States, and later, by the use of differential exchange rates in payment for identical merchandise-a cheap rate of exchange if the goods were, let us say, of British origin but an expensive rate of exchange if the goods were of American origin. With respect to the trade that was thus diverted, Argentine industry received protection

to the extent that British prices exceeded American prices. Self-Sufficiency for Military Preparedness. The European aggressors in World War II openly employed systems of exchange control as an integral part of their program of preparing for war. Exchange control facilitated such preparation (1) by granting water-tight protection to many strategic domestic industries and (2) by making several nearby states the economic vassals of the Axis powers.

#### Effects of Exchange Control

The variety of forms to be found among exchange-control systems, the various purposes which they are intended to serve, and the varying degrees of administrative discretion usually encountered, make for a complicated pattern of control. Despite the complexity of the pattern, however, it is possible to present a statement of the broad effects of exchange control along simple lines. Four interrelated types of effects may be distinguished.

First, exchange control has pronounced protective effects. Exchange control of a given degree of restrictiveness will be the more protective the lower the amount of protection already accorded by way of the tariff and the fewer are the quantitative restrictions on trade, such as import quotas. This can be more easily appreciated if it is observed that under a system of wholly prohibitive tariffs (a number of individual American tariffs are of this type) exchange control as such would not have any protective effects. Control over foreign payments would not, of course, be used in a case as extreme as this except to control capital movements. In the field of exchange control, the analogue of a prohibitive tariff would be the common practice of denying foreign exchange for so-called luxuries or nonessential articles. From this extreme the protective effect of exchange control varies until it is virtually nil in the case in which control is confined solely to capital movements.

In the second place, exchange control may have insulating effects, enabling an individual country to carry out a policy at

home of preventing depression or hastening economic recovery. Suppose, for example, that a particular country desires to embark on a so-called full employment policy at home in the face of widespread depression in the world at large. This country may engage in large-scale public investment, increasing the monetary circulation and thus creating a situation in which imports, if left free, would increase relative to exports and create a deficit in its balance of payments. The country may insulate its domestic policy from the balance of payments by employing exchange control as a device to ration imports. thus checking a likely deficit in the balance of payments at its In such a case the country clearly would be making a deliberate choice of an important sort-it would be sacrificing some of the potential benefits of international specialization in production for a high level of employment at home. Whether such a policy would lead to a lower real national income would depend upon the circumstances of the case.

Thirdly, exchange control usually has the effect of altering a country's terms of trade or, rather, of maintaining such terms at a more favorable level than would otherwise be possible. The terms of trade of, say, a major industrial nation may be modified in that nation's favor by several means. Among these might be mentioned the following: (1) a sharp reduction in foreign lending, (2) the raising of tariff barriers or the imposition of import quotas, and (3) the overvaluation of the currency by means of exchange control.

If a brief analysis of each of these means of improving a country's terms of trade is presented, the reader will be able to see clearly the relationship between exchange control and the terms of trade. A sharp reduction in foreign lending tends to improve the lender's trade terms by virtue of its depressive effect on the balance-of-payments position of borrowing countries. As a rule, a marked diminution of foreign lending is associated in borrowing countries with a reduction of receipts relative to payments, so that there develop tendencies towards the depreciation of the currencies of borrowing nations. For

example, in 1931 the sudden reduction in international lending by virtually depleting the foreign-exchange reserves of debtor countries, exposed their exchange rates to severe pressure, and depreciation followed in many instances. Although domestic prices tend for a time to remain relatively unchanged in both borrowing and lending countries, exchange depreciation in the borrowing country makes foreign prices cheap in terms of the lender's currency. To illustrate, if the currencies of the lender and borrower had exchanged on a 1 to 1 basis before the drop in foreign lending, they might exchange on a 1 to 1.25 basis after the reduction in foreign investment. At unchanged domestic prices in both countries, the lending country needs to spend only four fifths as much as before in order to acquire an unchanged quantity of goods from the borrowing country. The situation is not basically different as regards typical international trade goods, the prices of which are set in the world market and which, in consequence, initially rise in price in the borrowing country itself by the extent of any depreciation. The impact effect, therefore, is devoid of favorable implications for the terms of trade of the lending country. However, there usually follows a determination by borrowing countries to increase output-because of the stimulus of higher home prices-and to increase the quantity of exports-particularly of goods in surplus supply. Unloading goods in this fashion tends to depress world prices themselves, a situation that benefits the lending country. The benefit in question is measured by the increase in the quantity of imports that may be effected with an unchanged quantity of the lending country's exports -that is, the benefit is measured by the improvement in its terms of trade.

Consider next how a country, particularly a large one, can improve its terms of trade through the imposition or raising of protective tariffs or the introduction of import quotas. To foreign countries, new or additional protection in what was formerly an important market for their exports will amount to a reduction in demand—a shift of the demand curve to the

left-and will have its impact principally on their export prices. Such prices are likely to decline unless compensatory (as opposed to retaliatory) action is taken by the exporting countries themselves. If these countries do not reply with additional protection of their own, the country that used protection in the first place will gain directly, and possibly indirectly as well, as the result of a reduction in its import prices (calculated on a free-of-duty basis3). The indirect gain is likely to occur because of the deterioration in the balance-ofpayments position of other exporting countries, particularly if such countries are heavily dependent on sales to the country that imposed tariff or quota protection. When added up, the direct and indirect gains will represent an improvement in the terms of trade of the protected country. Clearly, other exporting countries will be corresponding losers as measured by a deterioration in their trade terms.

In the light of the two preceding paragraphs, it should not be difficult to see how exchange control can be used to improve a country's terms of trade, or, rather, to maintain such terms at a more favorable level than would otherwise be possible. Exchange control is a useful instrument for the purpose of maintaining an overvalued exchange rate-overvalued, that is, because the rate could not be kept at such level, given relative prices and incomes in the country, in the absence of control. The conceptually simple device of removing certain demands from effective participation in the exchange market strengthens supply relative to demand and prevents the exchange rate from falling to a lower level. Certain payments, such as those involved in servicing the country's foreign debt, can then be made at lower cost in local currency. Fewer goods and services are transferred to the creditor country in discharging debt service than would otherwise have been the case. To the extent, moreover, that the exchange-control country is able

Although the duty enters into the price of imported goods, as long as it is not prohibitive of imports it may be disregarded as far as the terms of trade are concerned, since the duty represents but a question of domestic income distribution as opposed to a transfer to foreigners.

to maintain or increase the volume of its exports, it will be able to operate directly on the terms of trade and maintain its export prices relative to import prices (or, stated differently, raise its export prices above what they would be in the absence of exchange control).

The fourth major effect of exchange control is commercial treatment of an internationally discriminatory character. This discrimination may be of two types. First, there is discrimination on the export side—that is, the unequal treatment of different countries or the unequal treatment of different export commodities to the same country. Monopolistic discrimination of this sort was practiced most frequently by Germany. Export discrimination was most pronounced against the smaller countries which were made dependent upon the German market by the special tactics employed by the German exchange authorities. As far as different commodities were concerned, the Germans also practiced discrimination among different goods on the basis of the elasticity of demand. German goods for which the foreign demand was known to be relatively inelastic were treated one way, whereas those commodities in relatively elastic demand were treated more favorably.

Apart from the German discrimination based on force or the threat of force, export discrimination may also be practiced without good reasons by a country pursuing an opportunistic policy. Consider the case of Turkey during World War II. This country had been granting the British an exchange rate for commercial transactions of 40 per cent below the official rate (46¢ per Turkish pound) while requiring purchases by the United States to be paid for at the highly overvalued official exchange rate (77¢ per Turkish pound). The Turks insisted, however, on charging the United States the same price in Turkish currency per unit of commodity that had been charged the British. When American buyers complained, the Turks argued that if they charged the United States a lower price than they did the British, they would be guilty of dis-

criminating against the latter. The same price in Turkish currency, however, represented a price in British pounds of only a little more than half as much as the price in United States dollars. A special reduced price in Turkish currency to the United States, far from constituting discrimination against Britain, would have continued to be discriminatory to the United States as long as the price in Turkish currency was not reduced to offset the advantageous exchange rate accorded to Britain. That is, the Turkish price to American buyers would have had to be cut to 60 per cent in order to equalize the effective price in foreign exchange as between buyers in England and in the United States.

Subsequently, as the United States continued to press for equal treatment, the Turks changed their argument. They pointed out that when Britain and France extended military loans to Turkey in 1939. Turkey was allowed to service such loans at its official exchange rate. As a result, during the inflation of World War II, Turkey used two exchange rates in its transactions with England: the official rate for debt service and a rate at a 40-per-cent discount from the official rate for its commercial exports. In view of this arrangement the Turks informed Americans requesting the same 40-per-cent discount from the official exchange rate that such an apparently equal exchange rate would really involve discrimination against the British, since the British would be getting a lower average discount than the Americans. Clearly, this was a specious argument. On this reasoning foreign debt settlements that involve scaling down interest and/or principal are also discriminatory to creditor countries; but such a claim has not yet been made, nor should it be.

Although information is lacking, official exchange-rate treatment may have been accorded Turkey on the loans referred to for the purpose of reducing the effective interest rate far below the nominal rate. In any case, for purposes of commercial trade, equality of exchange-rate treatment required that the same discount from the official rate be applicable to all trading

countries. After considerable protest Turkey finally accorded exchange-rate equality to the United States towards the end of 1944. This case involving Turkey in 1944 clearly indicates the way in which discrimination may masquerade as a supposedly innocent policy. It may be added that in April, 1945, the Turks finally adopted a policy of granting the same 40-per-cent discount from the overvalued official exchange rate for payments on exports going to all countries whose currencies were freely convertible into dollars, pounds sterling, or gold. Turkish exports to other (high-inflation) countries were still to be paid at the official rate of exchange. All this maneuvering was undertaken in order to avoid a straightforward depreciation of the currency. The case is an excellent illustration of an opportunistic policy of exchange control.

#### Summary

In view of the fact that the material in this chapter is presented in compact form, it may be better to indicate the high lights than to attempt a summary, as has been done at the end of other chapters. We began our discussion with a statement of the nature of exchange control. Exchange control exists whenever the government sets the terms governing the use of foreign exchange and tells its nationals (1) what they may or may not do with their foreign exchange and/or (2) the purposes for which they may or may not obtain foreign exchange. Although the control may take almost as many specific forms as there are types of payment arrangements, there are only a few basic variants of exchange control.

As to the mechanics of control, we found that four different (but partly overlapping) mechanisms could be distinguished. These were compensation agreements, the clearing agreement, the payments agreement, and nondiscriminatory exchange and trade control. The objectives of exchange control also overlap in some respects, but four different ends, each involving some measure of protection to domestic industry, were discussed. The first objective, historically considered, was that

of the maintenance of parity of exchange. This objective was gradually superseded by others in most exchange-control countries. The remaining objectives consisted of control as a source of government revenue, discriminatory bilateralism. and self-sufficiency for the sake of military preparedness. Finally, we described four general classes of effects, with overlapping again involved. An important effect of exchange control is that of according protection to domestic industry. Another effect may be to insulate the economy from depression abroad. Exchange control may also result in altering the country's terms of trade. Although the preceding effects reveal varying degrees of trade discrimination, we list as a separate effect the discrimination involved in export and/or import policy. Exchange control is definitely the most arbitrary and the least stable and predictable of the many known devices for interfering with international trade and finance. We shall see this more clearly after we have considered other types of control in chapters to follow.

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### Chapter 18

# Leading Types of Exchange Control

TITH respect mainly to the experience of the decade prior to World War II, three or four principal types of exchange control may be distinguished. Although each of these types is not distinctive in terms of basic economic criteria, it is treated as such for the purposes of this book. Such a treatment will aid the reader if he wishes to grasp the meaning of a type of control that may re-emerge in the postwar world to disturb the commercial interests of the United States for some time to come. The alternative to an essentially historical-descriptive treatment would be a strictly analytical one. However, since such an alternative treatment, at the present stage of the development of the theory of the subject, would be highly abstract and perhaps misleading, it is not attempted here.

Several types of exchange controls may be classified by reference to the chief practicing country as the (1) German, (2) Argentine, (3) Chilean, and (4) British.

### The German Type of Exchange Control

The German type, like most other types of exchange control, began in 1931 (before the advent of Hitler) as an attempt to protect the external value of the currency against the threat of depreciation traceable to the flight of capital—that is, the mass movement of funds to countries where it was believed that liquid wealth could be kept without serious loss of value. A mass movement of funds from Germany meant, of course, that the country's foreign-currency reserves would soon be

depleted. In order to see this situation in proper perspective, it should be recalled that 1931 was the year in which the international financial "system" suffered a general collapse.

Germany's international economic position was especially vulnerable on two counts. First, her post-World War I trade balance continued to display an import surplus despite the fact that the loss of her foreign investments and her merchant marine, and despite heavy reparation payments, which meant that her balance of payments on current account would remain unfavorable unless exports greatly exceeded imports. During the 1920's this unfavorable current-account balance was offset mainly by large long-term foreign loans to Germany. The loans from abroad operated as a gigantic artificial respirator to keep alive the German financial-reparations corpse. Secondly, Germany's position on short-term-capital account was very shaky. In the late 1920's large short-term credits in the form of bank deposits, acceptance credits, and other temporary loans were extended to German banks and business concerns. turn. Germany lent funds on short term to southeastern Europe. By the end of the 1920's Germany had lent on short term about half of what she had borrowed on the same terms. As long as such short-term loans to Germany were periodically renewed by foreign creditors. Germany did not have to worry about her short-term position. By 1930, however, foreigners had begun to lose confidence in the country's international finances. The depression in the agricultural countries of southeastern Europe weakened their ability to repay shortterm debts owed to Germany, whereupon Germany's foreign creditors began to withdraw their short-term credits. addition, both foreigners and Germans attempted to convert property in Germany into foreign assets. The pressure on the exchange rate was heavy, so much so, that the Hoover Moratorium (on reparations and intergovernmental debt) and a 100million-dollar international loan to Germany (both in June. 1931) did little to stem the flight of capital.

To achieve the end of protecting the value of the currency,

the Germans, in July, 1931, prohibited all transfers of capital to foreign countries, and monopolized the trade in foreign exchange in order to implement their policy. For a time there was no rationing of foreign exchange. The prohibition on flight capital generally involved two things: (1) nonpayment (freezing or blocking) of claims of foreigners, including those of foreign exporters who had extended credit to German buvers and (2) discounting by foreigners of German securities held abroad and of blocked bank balances held in Germany. The German currency thereupon was quoted at two or more values: the home-controlled or official rate of exchange and the foreign discounted rate. In order to counteract the foreign discount. which the Germans felt was necessary if they were to avoid rekindling fears of another hyper-inflation on the 1923 scale, the authorities had to do something more than maintain the old exchange parity as far as it concerned purchases of foreign exchange from, and sales to, their own nationals. The Germans also engaged in a campaign of inquiring into transactions that appeared superficially to be wholly domestic in character. As a result, they established control over the domestic bank accounts of foreigners to ensure that those bank accounts were not transferred to Germans for discharging obligations which otherwise would have yielded foreign exchange to the control authorities

The Germans also checked on the practice of underbilling exports in documents submitted to the control, since systematic underbilling enabled German exporters to leave abroad proceeds of exports representing the difference between the price actually paid by foreign buyers and the price shown to the German authorities on invoices. The Germans also found the employment of compensation and clearing agreements useful in connection with attempts to prevent discounts from the official exchange rate. Insofar as compensation deals could be arranged for goods that otherwise (for example, because of price) could not be exported, Germany obtained additional imports without adding measurably to the pressure on the

existing supply of foreign exchange: to that extent it became easier to maintain the official exchange rate. Clearing agreements also helped to maintain the old exchange parity, since such agreements tended to encourage other countries having exchange control to divert purchases to Germany. Subsequent to mid-1934, however, German exchange control was used mainly as a weapon of commercial policy, particularly to achieve the kind of self-sufficiency required for waging war and to attain international political objectives by the intimidating technique of Bloodless Invasion.<sup>1</sup>

What were the outstanding features of the German type of exchange control? The record shows that they concerned (1) the thoroughness of the control and (2) the purposes for which and the means by which such control was carried out. In other respects the German experience may be said to have had much in common with other types of exchange control.

With respect to the thoroughness of the German control, it may be pointed out that not a single type of foreign-exchange transaction was free from official control in one form or another. Many tens of thousands of persons were employed to ensure that the regulations were not violated. Penalties for violations were most severe, even the death penalty was decreed.

It is concerning the purposes and methods of German exchange control, particularly after the accession to power of Hitler, that the case can best be made for a special classification of the German experience. Especially arbitrary were the numerous and varied departures from the official exchange rate of 40¢. It is this type of exchange-rate structure that is referred to as a multiple-currency system. Thus, a rate, let us say, of 25¢ might be applied to the settlement of foreign-owned frozen bank balances. On some imports a premium (a price higher than the world price calculated at the official rate) might be paid, making such imports really salable at, let us

<sup>&</sup>lt;sup>1</sup>Einzig, P., Bloodless Invasion, London Duckworth, 1939. This book deals with the German technique as applied to the Balkans.

say, 30¢, whereas other imports had to take place at the official rate. Sometimes import surcharges were levied, raising the real exchange rate above the 40¢ level and providing the authorities with a fund from which to pay premiums on exports. Special exchange rates were also granted for so-called additional exports—that is, for such exports of German products as would not be exportable at the official (40¢) exchange rate because the price in foreign currency was not competitive.

With respect to the mechanisms used to effect German exchange control, four may be distinguished. The first is the compensation agreement. As has been explained in the preceding chapter, this agreement involves offsetting imports and exports by value in each transaction. At first, private German traders arranged such agreements after obtaining the approval of the authorities. Later such agreements were negotiated in each instance directly by the German authorities. Relatively little use was made of this technique for no other reason than because it involved most of the difficulties of formal barter transactions.

The second mechanism, the Aski² trading system, was an outgrowth and refinement of the private-compensation approach. Under the Aski system imports were authorized on the condition that the foreign sellers agreed to accept payment in special mark accounts usable for purchasing specified German goods for export only to the country in which the sellers resided. In other words, the Aski system permitted imports, but gave to Germany the right to determine unilaterally when and how payment in goods was to be made. Such a system, which was used mainly with countries with which clearing agreements had not been negotiated, allowed full scope for such tactics as the German authorities wished to carry out, subject only to the bargaining strength of other countries.

Since Aski marks could be used to pay for specified German

<sup>&</sup>lt;sup>2</sup>This term is the German abbreviation for foreigners' special accounts for domestic payments.

exports only to the country holding such marks, two consequences followed as far as the effective exchange rate was concerned. First, the value of Aski marks to importers in different foreign countries bore no systematic relation to one another. Secondly, the value of Aski marks also varied as between different importers in the same country. Each group of Aski accounts was treated separately depending on what the traffic would bear. The reason why Aski values, in terms of foreign currencies, varied so greatly as between foreign countries was that the German authorities varied the manner in which the Aski marks could be used. For example, the types of German goods eligible for purchase with Aski accounts were not always the same for different countries. Prices asked for eligible goods were always high, with the result that the same goods varied in attractiveness to buyers in different countries. Moreover, deliveries by Germany were slow and uncertain. The over-all result was a persistent tendency for Aski balances to accumulate in favor of many foreign countries, particularly those in Latin America. These countries often adopted arbitrary means of stimulating the demand for Aski marks, which further differentiated Aski values in different countries. The experience of the United States illustrates how the values of Aski marks also varied as between different importers in the same country. Thus, Aski balances obtained by firms exporting cotton typically amounted to a price for cotton 331/4 per cent above the world market price (calculated at the official mark rate). This meant a discount of 25 per cent3 from the official rate of exchange. In the case of copper, however, Germany was so anxious to obtain the metal that a premium of 66% per cent over the world price was paid; to American importers using copper Aski marks, therefore, German currency was obtained at about a 40-per-cent discount.

The question may arise as to whether American exporters

<sup>&</sup>lt;sup>a</sup> At a price premium of 33½ per cent, \$100.00 worth of marks would bring 250 marks (official exchange rate) plus \$3, or a total of 333 marks, equal to 30¢ each, or 10¢ (25 per cent) less than the official mark rate of 40¢.

profited from the price premiums that were received in Aski marks. As a general rule, such was not the case because the nominally higher mark prices generally were offset by discounts at which Aski marks had to be sold to importers in the United States. The marks had to be sold at about the same discount as was represented by the German import price premium because authorized German exports against particular Aski accounts were generally overpriced in marks by the same percentage. Thus, against a 331/2-per-cent price premium in Aski marks on American cotton, German exporters of, let us say, cameras obtained a price premium of 331/2 per cent if paid from the same mark accounts. By this means, both German imports and exports were transacted at an effective exchange rate of 30¢, or at a 25-per-cent depreciation from the official rate. Americans as a group, at least in the case of cotton Aski marks; were unaffected by the special Aski exchange system. That is to say, trade under the Aski system appears to have resulted in substantially the same terms of trade as if the exchange of goods between the two countries had taken place without price premiums at the official exchange rate. In Germany, however, the system amounted to an export subsidy paid by German importers, who were overcharged in marks as compared with prices at the official exchange rate. It was for this reason that the United States government ruled, in March, 1939, that the Aski system amounted to the subsidization of exports within the meaning of section 303 of the Tariff Act of 1930. Accordingly, dutiable German goods were made subject to the payment of countervailing United States import duties whenever such goods had been acquired by the sale of other goods on a premium basis.

A related German practice, of interest as displaying another phase of the art of exchange control, was that of stimulating additional exports. As stated earlier in this chapter, exports were ruled to be additional if they could not be effected merely because German prices, translated into foreign currencies at the official exchange rate, were in excess of world prices. To

illustrate, if costs in Germany were such as to make the price of an exportable article at a German port amount to 1.000 marks, the price at the official exchange rate would be \$400.00 f.o.b. port of origin. But Americans could acquire the same or similar product in, let us say, England at the equivalent of \$300.00. The German exporter obviously could not effect the sale of his article. He would then persuade the exchange authorities that special exchange treatment would enable Germany to make an additional export. The authorities then proceeded to manipulate the exchange rate so that the exporter could sell in the United States at \$300.00 and still obtain 1,000 marks for his article. The manipulation was as follows: Blocked-mark accounts belonging to foreigners, mainly financial creditors, were bought by the German authorities at 50 per cent of the official rate (at 20¢ instead of 40¢ per mark) and set aside as a fund. When the German exporter presented the facts of his mark costs and foreign selling prices to the authorities, the latter would allow him to buy just enough fund marks at 22¢ each as would enable him to sell his goods to a United States buyer at the world price of \$300.00. As a result, the German exporter would be authorized to use \$111.00 received from the American importer to buy 244 fund marks at 22¢ to the mark. The remaining \$189.00 received from the sale in the United States would be convertible into marks only at the official rate of 40¢, and would yield 756 marks. The German exporter's total proceeds would thus be 1,000 marks. For the entire transaction the average exchange rate would be 30c. or a depreciation of 25 per cent from the official exchange rate. By this roundabout process foreign creditors, with little hope of receiving payment of their claims in full at the (official) exchange rate at which they originally provided Germany with funds, accepted a settlement of their claims at but a fraction of par, for the ultimate benefit of German exporters. Foreign creditors thus subsidized German exports. The example cited. which was typical of many German exchange-control practices. clearly illustrates how the Germans were able to manipulate

their controls to favor their nationals at the expense of foreigners.

We turn next to a consideration of the third mechanism of German exchange-control—clearing agreements. The Aski and additional-export procedures represented essentially unilateral actions taken by the German authorities. In contrast, the clearing agreements involved bilateral actions in connection with German foreign trade, and as a general rule, clearing agreements were not entered into with countries with which Germany was already controlling trade on a unilateral basis. By the end of 1935, however, Germany had entered into clearing agreements with all European countries except the Soviet Union, England, and Albania, and also with three Latin American countries.

The terms on which trade was conducted and the value to Germany of her clearing agreements varied from case to case, mainly because of variations in her relative bargaining strength. Germany's bargaining position was strong-with countries in southeastern Europe (Hungary to Turkey) and relatively weak with western European nations. A comparison of German clearing experiences therefore is called for.

Germany's bargaining position relative to the southeastern European countries was strong chiefly because these countries, which were raw-material-producing areas normally engaging in a substantial exchange of their goods for German manufactures, had lost many of their markets as a result of the increased agricultural protectionism in industrial nations following 1930. Export surpluses in the principal agricultural countries of the world were increasing rapidly. Although Germany also increased her agricultural protectionism, the rearmament-based recovery of German industry stimulated imports. Germany preferred to rely on nearby sources of supply for strategic reasons, but nevertheless could threaten to shift her purchases from one farm-surplus country to another. Under the circumstances, southeastern European countries welcomed exports to Germany, even if it meant payment in in-

convertible clearing marks credited to their account with the German Clearing Office. With respect to German goods. prices (translated at the artificially high official-exchange rate) were less attractive, however, than the prices offered by suppliers in other countries. But the dominant agricultural producers of southeastern Europe, like most producer groups, were comparatively indifferent to the interests of consumers within their own borders. The very artificial official exchange rate. which made the prices of German goods excessive in terms of local currency, made it possible for the Germans to offer favorable prices on export sales to Germany. In other words, if the German mark was overvalued to the extent of a third (really worth in dollars 30¢ instead of 40¢, or about 1 instead of 1.33 Hungarian pengo) Germany would stand to gain as long as prices offered in local currency exceeded world prices by something less than the equivalent of mark overvaluation. Concretely, assuming the mark to be overvalued by a third, Germany would gain as long as Hungarian wheat, valued at, let us say, one pengo per unit at the world price, was bought by German importers at something less than 1.33 pengo. This is precisely what the Germans did. The premium prices were attractive to Hungarian farmers. At the same time the premium prices operated to increase Hungarian prices, checking exports to free-currency countries and thereby worsening Hungary's position in relation to such countries. German practice thus favored Hungarian agricultural producers while operating to depreciate the pengo in relation to free currencies. The reader will note how the factors bringing Hungary into the clutches of Germany were self-reinforcing.

Hungarian consumers, on the other hand, suffered because imports from Germany were obtained on increasingly disadvantageous terms. First, Germany deliberately discouraged exports to clearing partners while she was stimulating, through the additional-export procedure outlined above, exports to free-currency countries, such as the United States. That is, many kinds of German goods were not allowed to be exported

against payment in clearing marks. In addition, deliveries to clearing countries were usually far behind schedule, necessitating costly extensions of credit to exporters by the central banks of the capital-poor countries of southeastern Europe. In the third place, a number of German goods could be obtained only at considerably higher prices (at the official exchange rate) than it would have been necessary to pay had the goods been purchased in free-currency countries. Finally, Germany usually exported to clearing countries grades of merchandise inferior to those formerly supplied these countries.

The German clearing agreements with the continental countries of western Europe illustrate a distinctly different experience. Germany's bargaining position was relatively weak in relation to France. Switzerland, the Netherlands, and most of the Scandinavian countries. The German position was relatively weak because (1) each of these countries normally imported more from Germany than was exported to that nation, (2) most of these countries were free-exchange countries having sizable financial reserves, so that Germans sought a continuation of export surpluses in order to obtain free exchange for the purpose of making indispensable purchases in other free-exchange countries, such as the United States, and (3) the exports to Germany of the individual countries in this group did not constitute a dominant factor in their economic life. The net result of these three factors, therefore, was that these countries were able to take a strong independent stand on matters of trade policy, and did not have to submit to German pressures of the sort that were applied so successfully in southeastern Europe.

Two features stand out sharply with respect to the clearing agreements with the continental countries of western Europe. In the first place, the clearing agreements were negotiated on the initiative of the other countries rather than on that of Germany. Secondly, the agreements generally sought to obtain guarantees of regular payments by Germany on old commercial and investment indebtedness held by the nationals of

the other countries. Since Germany usually had favorable trade balances with these countries, there was no reason why Germany should do anything to disturb that situation. This explains why the Germans did not take the initiative in reaching these agreements. On the other hand, the continental countries of western Europe were anything but indifferent to the German practice of blocking payment on payments due their own nationals who were creditors of Germany. This explains why the western countries took the initiative to arrange clearing agreements and why these agreements had as their main objective forcing Germany to pay on back debt if that country was to continue to enjoy favorable export markets in their territories. From a statement of purposes, it is not difficult to envisage how the agreements worked. Although the clearing agreements differed in form from case to case, they usually provided that the funds obtained by Germany from its exports to them would be used as follows: First, to meet the current claims of those exporting to Germany; secondly, from the balance, specified percentages or amounts were to be paid on back debt; and thirdly, anything left would be placed at the free disposal of Germany. All transactions were settled in terms of official marks. In further contrast to the methods used in the trade with southeastern Europe, the Germans used the system of direct export subsidy in order to enable their exporters to avoid trade losses.

The final mechanism of German exchange control which we shall consider is the payments agreement. That this type of agreement often is similar to the clearing agreement with respect to its objectives is demonstrated by the fact that the payments agreement was also used to accomplish the same purpose that was achieved when the continental countries of western Europe signed clearing agreements with Germany. The first of Germany's payments agreements was signed late in 1934, when an Anglo-German accord was reached. Great Britain, like the continental countries, was reluctant to see Germany discriminate against her creditors and traders. Like

the continental nations, Britain had an adverse trade balance with Germany. The Anglo-German payments agreement provided three things: First, the German authorities (since they were the only party that had a formal exchange-control establishment) would earmark monthly in payment for British goods an amount in free foreign exchange equal to 55 per cent of the yield of German goods sold in Britain during the second preceding month. That is, Germany would earmark for January, 1935, free foreign exchange amounting to 55 per cent of the proceeds of German exports to England in November. 1934, and so on. If, however, the 55 per cent proved insufficient to pay for current British exports to Germany, Germany was given the right, subject to British consent, to restrict imports from Britain to 55 per cent of the proceeds of German exports to that country. In other words, restriction would obtain through direct curtailment of imports rather than by blocking the transfer of payments, as was Germany's customary practice when dealing with weaker countries. In the second place, the agreement provided that Germany would pay for all freight carried on British ships in pounds sterling. Thirdly, 10 per cent of the proceeds of German exports to Britain was to be used to liquidate old commercial debts within a period of one year. Finally, the Germans agreed to provide sterling to meet in full the interest on German government bonds held by British nationals. If German export proceeds exceeded the sum of the above items, the excess represented free exchange which the Germans could use for any purpose.4

#### The Argentine Type of Exchange Control

By comparison with the intricacies of German exchange control, the Argentine type represents a simple system of control. Argentina also made use of clearing and payments agreements.

<sup>&#</sup>x27;Subsequent to the Anglo-German payments agreement, Germany replaced its clearing agreements with Belgium (1935) and France (1937) with payments agreements on the general Anglo-German model.

although unlike Germany, the principal mechanism employed was the payments agreement. But the truly distinctive feature of Argentine exchange control was its dual-market structure—the dominant official or controlled area and the small, yet influential, free market. In most countries subject to exchange control, black (illegal) markets were generally to be found, at least during the early years of the control. The Argentine authorities at first fought the black market, only later to accord it formal recognition as the legal free market. Although more restricted in scope than in the 1930's, the free market exists to this day (1946). The discussion that follows, however, treats of the free market and the general features of Argentine exchange control as they existed in the mid-1930's.

Argentina's free-exchange market constituted a comparatively small island in a broad sea of official control. On the supply side, exchange was derived from clearly specified sources: expenditures by foreign tourists, imports of capital, ocean freights, and exports of merchandise to all neighboring countries save Brazil, to name only the leading sources. Actively competing for this supply of exchange were the following principal demanders: importers of goods from the United States, all except British companies having to make private financial remittances of funds, and Argentine tourists planning to travel abroad. Within this legally defined market framework, the forces, which are found in any free-exchange market, operated without restriction. The exchange rate fluctuated regularly in response to changes in the strength of demand relative to supply. On several important occasions. moreover, movements in the free-exchange rate were decisive factors shaping exchange-rate policy in the dominant official market. At no time since the imposition of exchange control, however, did the free market assume major importance. At its height, less than a fifth of total exchange transactions took place in the free market. This market nevertheless preserved an important degree of freedom, and, although its scope

has been changed from time to time, it has served the useful purpose of making exchange control more tolerable than has been customary to date.

The great buik of Argentina's exchange transactions, however, were required by law to go through the official market All of the major export products were sold in this market, and most of Argentina's imports of goods and services were paid for at one or the other of two official exchange rates. Structurally, the official market was of simple design. Foreign exchange resulting from the sale abroad of all major exports had to be surrendered (sold) to the authorities at the official buying rate of exchange of approximately 3 pesos per dollar. turn, foreign payments for preferred imports or for preferred financial (profit) remittances could be made only at one or the other of two official selling rates of exchange, or at about 31/2 to 4 pesos per dollar. The difference between the buying and selling rates represented a gross profit for the exchange control. This gross profit (or exchange margin), which represented an indirect tax on Argentine exports, was used for two general purposes: First, it enabled the government to meet its foreign debt service and other foreign payments at a specially favorable exchange rate, thereby effecting nominal savings for the Argentine treasury. (Had the government imposed a uniform export tax vielding the same revenue as the exchange margin, neither the Argentine exporter nor the government would have been any the worse off: the exporter would have realized the same net return in pesos, and the government's receipts and outlays would simply have been expressed in larger peso figures.) In the second place, the exchange margin enabled the government to offer financial assistance to agriculture. Such financial assistance also could have been offered from revenue derived from a uniform export tax. Since, however, an export tax is only a device for obtaining revenue, the main task of controlling foreign payments would still require an exchange-control apparatus. The Argentine authorities,

therefore, combined revenue and control features in their system of exchange control.

A discussion of Argentine exchange control, however brief, should not close without a statement of the purposes for which it was established. The control was introduced for two basic reasons: First, to enable the authorities to have a flexible control over the main constituents of the Argentine balance of payments; and second, to permit the implementation of a commercial policy in which discrimination against the trade of a few countries, notably the United States, was a cardinal objective. We need not consider at this point the first of the two reasons for the introduction of exchange control in Argentina. With respect to the second, however, a few words are in order.

When the dual-market control was first inaugurated in 1933, demands which were forced to go unsatisfied during preceding months once more could legally be satisfied in the free market. As this market represented but a small part of the total supply of exchange, the backlog of demand served to keep the freemarket exchange rate well above the preferred official selling rate. Imports from the United States, most of which could be paid for only in the free market, thus were at a competitive disadvantage of about 20 per cent. When, late in 1934, this disadvantage narrowed to about 10 per cent, as a result of an improved supply owing mainly to increased capital imports entering through the free market, favored trading countries became disturbed lest their preferred position should be offset by the continued appreciation of the free-market exchange rate. Pressure from the favored countries finally succeeded. during April, 1935, in inducing the Argentine authorities to impose an exchange surcharge (tax) on all imports that had to be paid for in the free market. This surcharge amounted to 20 per cent with a credit being allowed for the amount by which the free-market rate exceeded the official (preferred) selling In other words, by means of this surcharge Britain and

other favored countries were assured that goods from the United States (and one or two other countries) would be faced with not less than a 20-per-cent disadvantage. By early 1938 the free-market peso had again depreciated so that it was about 25 per cent above the official rate. At this point the authorities engaged in the empty gesture of reducing the surcharge to 10 per cent, notwithstanding the fact that the favored countries were now enjoying a 25-per-cent instead of a 20-per-cent advantage! But products of United States origin continued to be imported in some volume into Argentina. Effective January 1, 1939, therefore, it was decreed that imported goods no longer could be paid for through the free market. From that day forward, all imports of United States origin were subject to formal import quotas, so that the Argentine authorities could provide advance assurance to favored countries of the degree of foreign competition that they could expect in the Argentine market. Such, in rough outline, was the unfolding of a vicious and discriminatory exchange-control policy.

#### The Chilean Type of Exchange Control

As has been indicated in the preceding chapter, Chile affords a good illustration of a country which has practiced an internationally nondiscriminatory form of exchange control. A given country is generally forced to follow a discriminatory allocation of exchange if the bulk of the foreign currencies, earned from its exports of goods and services, are allowed to be disposed of only in ways specified by the foreign countries or if the given country's dependence on a particular foreign market is so great that that country makes continued purchases conditional upon a discriminatory treatment of imports from other countries by the given country. In the case of Chile, the foreign pressure for discriminatory treatment of imports does not exist because most of Chile's exports are regularly paid for in dollars. The United States has never sought to influence foreign countries with respect to the manner in which the dollar proceeds of exports should be used. A foreign country is free to use dollars which it has earned to buy American goods and services or to transfer the dollars to another country in order to buy that country's goods and services. The United States has never practiced the art of "you scratch my back and I'll scratch yours." In short, the trade policy of the United States is that of multilateralism. The ideal situation for a country that wishes to practice exchange control is that in which the bulk of its foreign earnings is expressed in the currencies of countries practicing multilateralism. The situation is ideal in the sense that the country in question is free to devise a system of control, for balance-of-payments purposes, without interference, direct or indirect, from foreign countries.

Since Chilean exchange control is of the nondiscriminatory sort, our discussion need only be concerned with the structure of the control. In a typical year, approximately two thirds of Chile's exports are derived from three commodities; copper. nitrates, and iron ore. Some day these mineral resources will be exhausted. The bulk of the production of these commodities is from plants owned by citizens of the United States. In lieu of heavier direct taxes on these properties and their income. Chile has in effect imposed indirect taxes by requiring that Chilean pesos needed by the companies to cover local production costs be bought at an especially high price (at the official buying rate of exchange of 19.37 pesos per dollar). Dollars so acquired by Chile constitute the bulk of the available foreign exchange. These dollars are then sold at either 25 or 31 pesos per dollar. The difference between 19.37 and either 25 or 31 represents, of course, the gross profit or exchange margin accruing to the government. Since 1939, most sales of exchange have been at the rate of 31 pesos to the dollar, so that the exchange margin amounts to a tax of 37.5 per cent. This is willingly paid by the mining companies in view of the fact that they are exporting Chile's principal wealth, her irreplaceable mineral deposits.

Before considering the manner in which exchange is rationed

#### COMMERCIAL POLICY

in Chile, let us take up the question of the way in which Chile's secondary exports are affected by her exchange control. By secondary exports are meant such products as fruits and vegetables, wool, hemp, rice, and the output of the small, relatively inefficient Chilean-owned mines. Such exporters are required to surrender from 1 to 10 per cent of their foreign currency proceeds at the official buying rate of exchange of 19.37 pesos per dollar. The balance of the proceeds once was sold in the foreign-exchange market at 25 pesos per dollar, but since 1939. has been disposed of at the 31-peso rate. By varying, on a commodity by commodity basis, the portion of export proceeds which must be sold at the official buying rate of exchange, the Chileans achieve a selective depreciation of the peso, since the exporter obtains more pesos per dollar of exports if the surrender rate is 1 per cent than if it is 10 per cent. By the same token, it may be charged that Chile operates a system of selective subsidies with respect to its secondary exports.

Chile's system of allocating exchange for imports of goods and services represents the most distinctive feature of its exchange control. Instead of discriminating between nations, favoring imports from some countries at the expense of imports from other countries. Chile follows a policy of differential treatment of commodities and services. Specified luxury goods and purely financial transfers either are denied exchange or are placed last on the list of the categories for which foreign exchange will be granted. At the other extreme, Chile's most essential imports are granted exchange on the best terms. In recent years these terms typically have consisted of 25 per cent of needed exchange at the rate of 25 pesos per dollar and the balance at the general selling rate of 31 pesos to the dollar. The great bulk of essential imports, however, is paid for at the single rate of 31 pesos. In each case, it is important to note, the treatment accorded by the exchange-control authorities is influenced not by the question of the country of origin, but solely by the essentiality of the commodity or service. Finally, it should be pointed out that an illegal or black market has

prevailed in Chile since the inception of exchange control. But this market is unimportant, being used mainly for tourist expenditures.

## The British Type of Exchange Control

Great Britain, long the symbol of monetary internationalism and free financial institutions, adopted exchange control as a wartime measure. Because she has publicly announced her intention of maintaining exchange control during the so-called transition period after World War II, and because wartime measures, ostensibly temporary in character, often remain with slight modification as permanent institutions, it is fitting that brief consideration be given to the outstanding features of British exchange control.

Speaking before a group of Washington officials in 1944, Lord Keynes, head of a British Treasury delegation dealing with Lend-Lease matters, described British exchange control as something which, like Topsy, "just grew." He was referring particularly to the varying relationships between the individual exchange controls in *sterling-area* countries and the British control in London. Although the system just grew, with the result that a given type of problem is not handled in a strictly uniform way in all cases, there are enough general characteristics to enable us to describe British control as a type. For the present, we shall indicate some of the main features in outline form, since Chapter 29 is devoted to an extended treatment of the sterling area.

In the first place, the British sterling-area control is characterized by a system of semivoluntary pooling of all principal foreign currencies and gold. Before World War II the sterling-area countries (mainly the colonies and dominions other than Canada) voluntarily relinquished such currencies and gold in return for sterling balances. And prior to the war, the sterling countries maintained their currency and banking reserves chiefly in London. The prewar case, however, differed sharply from the situation since 1939 in regard to the terms on which

currencies and gold are pooled in London. In the prewar case members of the sterling area could always convert their pounds sterling into other currencies (for example, into dollars) without formal restrictions. The British balance-of-payments position before the war, although unsatisfactory, permitted the free convertibility of currencies. After 1939, however, Britain's limited foreign financial resources, which had to be mobilized for war purposes, were insufficient to permit the free convertibility of sterling into other currencies. It was decided, therefore, that sterling-area countries should continue to pool their resources in exchange for blocked sterling. The British assured the member countries that sufficient dollars or other scarce currencies would be released against blocked sterling to enable members to pay for strictly essential imports of goods and services from places outside the sterling area.

A second feature, fraught with serious discriminatory possibilities, is the preferential treatment of intersterling-area trade for foreign-exchange reasons. The rule which is generally followed is simple: dollars and other scarce currencies are not made available to importers in sterling-area countries if the commodity they wish to import is available from a supplier within the sterling area. Dollars, for example, are made available only if the commodity or service is strictly essential and unavailable from sterling-area sources. Unlike most exchange-control systems, however, British control does not make use of multiple-exchange rates. All conversions are made at the official rate of exchange.

Thirdly, another important characteristic is the large volume of short-term sterling balances which have been accumulated by sterling-area and other countries largely as a result of the war. These balances, with few exceptions, are not usable by their owners: they remain blocked in London. There is every indication, however, that many of these balances will be funded into long-term debts, payable slowly and over a long period. Those that remain unfunded may present many problems from the point of view of discrimination in international trade. In particular, it must not be forgotten

that the Germans erected their maze of discriminatory exchange controls in part on the basis of large blocked-mark balances belonging to foreigners. Whenever such balances hang over the market, there is a temptation to work them off by paying as few cents as possible on the dollar. In international trade such methods inevitably involve some form of discrimination. It should be added, however, that Britain together with 43 other nations signified its intention (at the United Nations Monetary and Financial Conference of 1944) of returning as soon as possible after the war to a nondiscriminatory multilateral system of international trade and payments.

#### Summary

Among the four national types of exchange control which have been singled out for treatment in this chapter, the German type illustrates best how complex and how discriminatory an exchange-control system can really be. There can be no doubt that the system would have become even more complicated had it been continued, since efforts would have been made to exploit still more of the possibilities which are inherent in the many patterns of international trade and finance. The German experience is significant, therefore, principally because it illustrates the excesses to which trading may be subjected when nations deliberately depart from a system of equality of treatment. For purposes of a summary it may be said that the German type of control exhibited every type of mechanism and every kind of effect which was outlined in the preceding chapter. The extent to which international trade was perverted to meet antisocial ends was without parallel in modern history.

Like most other types of exchange control, the Argentine version also had its beginning as part of a program to safeguard the value of the currency. Within a short time, however, the Argentine authorities used the control as the principal means of implementing a policy of trade discrimination which was directed principally against the United States. The

distinctive feature of the Argentine system was its legal free-exchange market through which specified types of transactions could take place along traditional, restrictionless lines. Capital transactions were actually encouraged by this arrangement, in contrast to the usual experience in which exchange restrictions are imposed mainly to control capital movements. But the free market never assumed major importance. The bulk of the foreign-exchange transactions were required to pass through the controlled official market.

Chilean exchange control is important as a type principally because it operated in an internationally nondiscriminatory manner. Transactions were subject to license for the purpose of keeping Chilean payments in line with the country's receipts. Restrictions on the use of foreign exchange were thus imposed in terms of the essentiality of the commodity or service to be imported. In other words, the criteria in terms of which exchange was allocated did not include the matter of the national origin of the commodity or service. In common with most systems of control, the Chilean system also employed multiple exchange rates with respect to both imports and exports.

We also entered into a brief discussion of the British type of exchange control, which is a product of World War II. As far as the exchange rate is concerned, the British type is a singlerate system. The official rate of exchange is the only rate at which pounds are converted into foreign currencies, and vice Another feature of the control is the preferential treatment of intersterling-area trade for foreign-exchange reasons. This results in discrimination far worse than that involved in the system of imperial tariff preference which, as we saw earlier, is itself unduly restrictive of trade. Finally, British exchange control is also characterized by a mass of war-accumulated blocked sterling balances. Unless such balances are funded into long-term debts, there is a danger that arrangements for the liquidation of such abnormal balances may lead to some of the excesses which characterized the German methods of handling foreign-owned mark balances in the 1930's.

## Chapter 19

## An Evaluation of Trade Controls

A NUMBER of arguments in favor of protection, many of them specious, but a few meriting serious consideration, were presented in Chapters 14 and 15. Different types of trade control have also been described. We shall now attempt to give as scientific an evaluation of this entire question as space permits. This cannot be done in a few paragraphs, as no cut and dried verdict is possible. The reader who wishes to label all forms of international trade restriction simply as good or bad will be disappointed.

#### A Basis of Evaluation

#### What goal?

The worth of a policy cannot be ascertained unless we know what goals are desirable. Obviously people will never agree that a certain program is good or bad unless they all believe in the worth of the same objectives. Unanimity of this kind is a prerequisite for any fruitful discussion of tariffs, quotas, or exchange control. Unfortunately, in the past, part of the controversy over protection has been attributable to people who have tacitly adopted different goals. Thus, some groups stress national defense, others desire the restoration of former trade patterns, and the remainder may strive simply for an increase in the supply of goods and services.

The economist as such does not know what the proper goals are. It is not for him to say that material prosperity is more or less important than preparing for the nation's defense. The

economist cannot be the sole judge of the worth of national liberty and decide whether or not the cost of its defense is too high. These judgments of value must be left to the community as a whole, and the economist, like any citizen, can decide them for himself alone.

Nevertheless, most economists have an occupational bias, which persuades them that maximizing the output of consumable goods and services is the goal of society. This a priori assumption is usually made even though exceptions are frequently recognized. However, the wise economist knows that people do not always want to be guided by considerations of economics, just as a wise doctor knows that people often prefer not to lead healthy lives. Or sometimes the economist, although remembering these human failings, finds them too imponderable to be included in his calculation, and so omits them from it. We shall put on the same kind of blinkers and suppose that the objectives of nations and governments should be and are economic. We shall appraise policies in terms of the quantity of consumable goods produced and services offered. Material prosperity shall be our aim.

### Whose prosperity?

This decision immediately introduces what is sometimes called the problem of interpersonal comparisons. Economic regulations, of which tariffs and quotas are simply specific examples, always benefit some persons but injure others. If a tariff is raised, certain producers and their suppliers will benefit, but users of the protected product will suffer, and many other interests will also be affected in various ways. It is hardly ever true that the same act of economic regulation will either help or harm all of the nationals of a given country. The effect will instead be mixed. Under such circumstances it becomes extremely difficult, for example, to prescribe what the United States should do about wool.

The nature of this difficulty must be understood. A government is supposed to act in the interests of all its nationals.

In most instances the personal incidence of any regulatory act will be negative for some and positive for others. How can all these minuses and pluses be added up and offset against one another? How can the net effect be computed? And is it fair to inflict an injury on some citizens so that others can gain advantages? Consideration of economic policy more often than not terminates in a discussion of ethics.

One fairly common-sense solution presents itself. In most cases it should be more or less possible to estimate the extent of the injury inflicted upon the people who have been adversely affected by a change in trade regulation. Economic losses can usually be expressed in money terms even though the proper magnitude is often difficult to gauge. Conversely, the gains of those who benefit from the same government decision can also be given a monetary expression, although the accuracy of estimate may also be poor. It should often be possible to arrange a system of compensation whereby the losses of one group are covered by payments from other groups which benefit. For example, reverting to the case of the United States wool tariff, its removal might benefit wool users in America to such an extent that, if some machinery of compensation were devised, the wool users could foot the indicated bill of reparation and still remain better off economically than before. is difficult to object logically to a tariff reduction whereby. despite full compensation of all sufferers, the position of other members of the community would be improved. A national economy has presumably been advantaged by a government's action if the resultant gain to those who benefit is more than adequate to compensate everyone who has been injured.

A few readers may think that this proposal for compensation amounts to nothing more than a scheme to rob Peter to pay Paul. The number of dollars paid by those who are benefited will inevitably equal the number of dollars received by those who are injured. There must always be a *financial* balance. However, this does not mean that there will simply be a great deal of red tape without economic improvement. It is almost

certain that the total real gains and total real losses, as measured by buyers' and suppliers' surpluses explained below, will be unequal and opposite, and therefore will not cancel out. Any reordering of trade involves a reallocation of economic resources which will probably be more or less efficient. If it is a superior allocation, there will be a net economic gain somewhere in the system, and this must somehow be distributed to somebody.

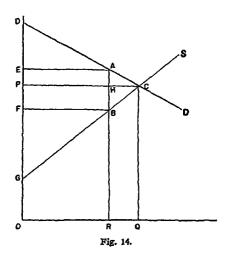
The next problem is whether an economic change might even be considered desirable if full compensation according to the above formula, though not actually attempted, were possible. Specifically, let us suppose that there would be a net economic gain from lowering the wool tariff. Do we, then, have to recompense the wool growers, the sheep shearers and herders, the grazing land owners, and so on? Or would it be enough that the wool users were more than commensurately benefited? This is largely an ethical question which we shall only touch upon briefly.

The first consideration is that many who currently benefit from the wool tariff may do so undeservedly. Perhaps some beneficiaries successfully agitated for the present tariff and so helped to impose an uneconomic burden on wool users, and if we applied our compensation rule backwards over time, we should find that these tariff beneficiaries are far in arrears on the payments owing to tariff casualties. On the other hand, many persons in the domestic sheep business have invested their money in land and stock in an entirely moral way, and on the expectation that the *normal* wool prices of the present time will continue. It would be hard to excuse partial confiscation of their wealth merely by saying that the people who use wool products will benefit more.

However, all this is a problem for the community conscience in general, and for the politician in particular. The economist as such does not have to worry about it. His responsibility is to estimate whether or not a net gain is likely to result from some tariff or quota change. Even this relatively limited task should keep him sufficiently occupied.

#### What yardstick?

The economist must devise some yardstick for measuring the various real gains and losses experienced by people following a



change in international trade regulation. In general, we shall follow what might be loosely termed the surplus approach. There are three parties primarily interested in most tariff or quota changes: (1) users of the product, on whom the incidence can be estimated from the changes in their buyers' surplus, (2) suppliers of the product, on whom the incidence is indicated by changes in their suppliers' surplus, and (3) the government, changes in whose revenue share must be estimated. There are other groups with an interest at stake. and

any change in a tariff or quota initiates an ever-widening circle of repercussion. But these subsidiary effects tend to diminish as they are diffused, and so we neglect them.

An illustration of these surpluses and of the approach in general is afforded by the simple case of a milk market in which the demand (D) and supply (S) are both domestic. (Fig. 14.) The equilibrium price is OP and the quantity OQ. Every unit of milk is sold at the same price in this illustration. However, there are many milk buyers who have maximum reservation prices considerably in excess of the market price. We know this from the fact that the demand curve lies above the price line for all but the "last" unit exchanged. This difference between what buyers would be willing to pay if necessary and what they actually do have to pay is the aggregate buyers' surplus, which is depicted by the area DCP in the diagram. Analogously, the suppliers receive a common price, which is in excess of their minimum reservation prices, save for the last traded unit. The difference between what suppliers actually receive and what they would have been willing to accept if necessary is the aggregate suppliers' surplus, which is represented in Figure 14 by PCG. The imposition of a 20¢ unit tax (represented by a vertical distance equal to EF) will raise the effective buyers' price to OE and lower the effective suppliers' price to OF. Buyers' surplus is now reduced by EACP, and suppliers' surplus is reduced by PCBF. The government's tax collections are EABF. Consequently there is a net loss of ABC. This loss arises from the fact that the tax has driven resources out of the dairy industry into less satisfactory alternative employments. Basically, our analysis is the same whether we are considering the effects of a tax on a domestic good or whether we are dealing with an import restriction on a product which is not made at home. The only important modification is that if we are taking the narrow viewpoint of the importing nation's interest alone, we do not worry about suppliers' surplus, for these exporters are foreigners.

(The surplus approach to an evaluation of tariffs and quotas

operates within the framework of existing inequalities in income size.) It is well known that a dollar has far more real importance to a poor family than to a rich one. Occasionally it happens that those groups who suffer from a tariff reduction are predominantly rich, whereas those who gain thereby are for the most part poor. It is possible in such a circumstance that the real (utility) gain, experienced by those poor families which benefit, is worth only a relatively few dollars to them because of the high utility value which they are forced to place unon money by their poverty. And the real (utility) loss to the rich persons who suffer, although possibly small if it could be measured in some utility unit, may have a large money value because of the small importance of a dollar to wealthy people. Conceivably, the number of dollars which the poor beneficiaries might be able to pay as compensation might be less than the number of dollars to which the rich sufferers would be entitled. Consequently, according to our formula the contemplated tariff change should be held undesirable, and hence remain unimplemented. And yet the real gains, measured in utility rather than money units, might be greater than the real losses. However, this must always remain a coniectural possibility because it is impossible to measure and compare the utilities and disutilities to different people, and such an inability may not be a very serious defect in any case. It certainly is not a peculiar weakness of this method because a free-enterprise system operating through a price mechanism allocates resources according to the monetary strength of demand and supply forces rather than to utilitarian likes and dislikes. Finally, there are no grounds for supposing that in all save exceptional cases a tariff (or quota) change will only cause gains for the rich, losses for the poor, or vice versa. Persons of greatly varying income will normally be found amongst both the sufferers and the beneficiaries of altered tariffs.

Against these mild disabilities, there are many positive advantages which can be claimed for the surplus approach. (The three principal elements of suppliers' surplus, buyers' surplus,

and government revenue are not too many to handle, and can be simultaneously depicted on an ordinary market diagram. Moreover, the entire demand or supply schedule need not be ascertainable. The approximate location of each schedule over a limited quantity range need alone be estimated, and it is the extent of change, and not the absolute magnitude of these three elements that is significant. In order to reach a policy prescription it will often suffice to judge whether the import supply schedule is flat or upward sloping. We will then have a method that states with some assurance the desirability of a proposed change in trade regulation. Such an approach should provide a more scientific appraisal than volumes of political rhetoric can ever contribute.)

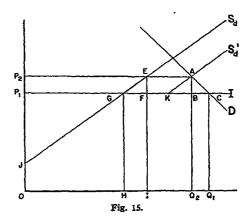
## Burden of an Individual Duty

The surplus approach is especially fruitful when examining the net effect of a single tariff, or fixed quota. We shall first consider the burden of such restrictions when the imported commodity is in varied conditions of supply. The evaluation is primarily from the viewpoint of the importing country alone, for policy decisions are concerned almost exclusively with this case.

## No home production and an infinitely elastic supply of imports

Sometimes the importing country is entirely dependent upon imports for some commodity. Moreover, and especially when the importing nation absorbs only a fraction of the total supply entering world trade, the supply schedule of imports will for all practical purposes appear to be horizontal. This means that variations in the amount imported by the nation in question will have no appreciable price repercussions in the world market; or expressed in technical terms, the price elasticity of imports is infinite.

When these two conditions prevail, the market situation in the importing country can be represented by Figure 15. The supply schedule  $(P_1I)$  is horizontal. The full effect of the tariff will be directed towards raising the domestic price to consumers, who, consequently, purchase less than before. The government of the importing country collects customs totalling  $P_2ABP_1$ , but the consumers of this same nation lose a consumers' surplus of  $P_2ACP_1$ , so that there is a net loss of ABC.



Using this same diagram, it may be of interest to contrast the incidence of a quota having the same restrictive effect as the tariff just considered. This would mean that only  $OQ_2$  units would be permitted to enter. The competitive price in the domestic market would once again rise to  $OP_2$ . In all other respects the burden of a tariff and a quota must be sharply distinguished. There is no customs revenue for the government which sets a quota. Those importers who are fortunate or shrewd enough to secure licenses will harvest a windfall profit aggregating about  $P_2ABP_1$ . There is no way of predicting the nationality of those importers who secure licenses. If they were all foreigners the total burden of the quota on the importing nation will be an unmitigated  $P_2ACP_1$ .

This loss will be reduced to the extent that importers happen to be nationals. However, it is obvious that all importers will not be nationals, and it is a safe generalization that a quota will do greater damage to the interests of the importing country than a tariff of like restrictive power.

# Some home production and an infinitely elastic supply of imports

Sometimes there are a few domestic producers of the dutiable commodity who have such low costs that they are able to compete with imports from abroad. The same diagram (Fig. 15) depicts such a case and also supposes once again that the imports are perfectly elastic in supply. In this instance the burden of a tariff is slightly more complicated because there is some domestic suppliers' surplus to include in our calculations.

The first problem is to determine the total supply schedule. This is made up by horizontally summing the domestic supply schedule (Sd) and the import supply schedule  $(P_1I)$ . The result of this addition is a total supply schedule of JGI.

Let us suppose a specific tariff of  $P_2P_1$  per unit which reduces imports from  $HQ_1$  to  $IQ_2$ . Domestic production rises to OI. The price at home rises to  $OP_2$  from  $OP_1$ . There is a reduction in consumers' surplus of  $P_2ACP_1$ . Against this must be set customs collections of ABFE and domestic suppliers' surplus of  $P_1GEP_2$ . There is then a net loss of ABC + EFG, which will be greater the higher is the tariff.

The above evaluation also indicates the burden on the world economy as a whole. When imports are in infinitely elastic supply, there is no incidence on the exporting nations; accordingly, the world burden is coincident with that of the country which taxes the import. However, this is not true when additional imports are only forthcoming at higher prices.

What will be the burden of a quota of like restrictive effect which permits the entry of only  $IQ_2$  units from abroad? Available supplies would come entirely from domestic production until the price had risen to  $OP_1$ . Then imports would

take over until the quota was exhausted. After this, further supplies would come from home production again and would await a higher price. Hence, the total supply schedule is JGKSd1. (GK is equal to IQ2 by construction.) The quantity purchased is again OQ2, of which amount GK units are imported, and the common price is OP2. There is a loss in buvers' surplus of P2ACP1, and a gain in suppliers' surplus of P<sub>2</sub>EGP<sub>1</sub>. There is no offset arising from customs collection. At worst the net loss might be EACG. This presupposes that the trading gain of EAKG accrues entirely to foreign importing concerns. The most favorable possibility would be a net loss of ACK, but this would require that all commercial trading gains go to nationals. It is noteworthy also that ACK equals ABC plus EFG in area. In other words, the best possibility, from the viewpoint of the importing nation, is as bad as would be expected from a tariff. The international loss is always ACK.

## No home production and a finitely elastic supply of imports

A clear-cut appraisal of this situation calls for the use of marginal-cost and marginal-revenue functions after the manner of treatment in Chapter 10. However, a more clumsy presentation which is limited to demand and supply schedules can be made with the help of Figure 14.

A specific tariff of EF per unit will raise the domestic market price to OE, but the world price received by foreign suppliers will fall to OF. There will be customs collections amounting to EABF, but against this there will be a loss in consumers' surplus of EACP. There is no way of knowing a priori whether the gain in customs collections will be greater or less than the loss in consumers' surplus. Diagrammatically, there will be a net gain if the area PHBF is greater than the area AHC. This will tend to be so if the duty rate is fairly low and if the supply of imports is relatively inelastic.

However, if we were to adopt a world viewpoint, there would certainly be a net loss, because the reduction in suppliers' sur-

plus of *PCBF* has then to be considered. This duty would hence entail a net loss for the world economy represented by *ABC*.

A fixed quota of OR would have the same restrictive effect as a specific duty of EF and would, therefore, reduce imports to OR and raise the domestic price to OE. There is no government revenue to serve as a credit item unless import licenses are auctioned off by the quota authority. The crucial question is the extent to which the trading profits accrue to nationals rather than to foreigners. The net loss will vary between EACP and (AHC-PHBF). This latter difference may be negative, indicating a net gain if there is a strong monopsony position awaiting exploitation. The international loss will always be ABC.

## Some home production and a finitely elastic supply of imports

This case is similar to the one immediately above. Generally speaking, if we can assume that there is no danger of retaliation by other nations, there is a low duty rate which will maximize the interests of the importing country. There is always an international loss, however.

### Concluding comment

Several rules can be induced from these four cases. (A duty always inflicts a net loss on the receiving country if its imports are supplied under conditions of infinite elasticity. A quota will usually work even greater damage than a duty. The situation is more complicated when the elasticity of the import supply is finite. It is then conceivable that a duty will occasion a net benefit for the importing country. However, the duty rate must be kept low if benefits are to be won in this way. These gains will tend to be slight unless the importing country enjoys a marked degree of monopsony power, as is reflected in a relatively inelastic supply of imports. Moreover, any gain which does accrue to the taxing country inflicts a dis-

proportionately large injury on exporting countries; in other words, there is a net international loss. This fact carries a practical warning: the decision by a government to tax a particular import is often the beginning of a series of such actions and not an isolated event. Other countries, suffering injury, may retaliate. The country that dealt the first blow is then struck in return. The international loss which is accumulated in this fashion will be suffered by all countries.)

#### The Free Trade Case

Some of the most destructive arguments against protection are to be found in the positive claims made on behalf of free trade. The major case which can be made for laissez faire policies towards international commerce is based on the ground that this permits the most efficient allocation of resources, and hence yields the maximum national income. This central theme has been expressed in various ways.

#### Exchange is beneficial and should not be restricted

The simplest of all pleas for untrammeled foreign commerce is that this stimulates international trading and that the voluntary exchange of goods is advantageous to both parties. The indirect effect of foreign trade is that each nation gives up something that it has in relative abundance (and consequently discounts) for other kinds of commodities of which there is a relative scarcity (and which are hence highly prized). Both countries benefit. The fact that such trade is usually triangular and is carried on through the medium of money does not alter this fundamental truth. Restrictions on trade lessen the possibility of realizing such gains, and a potential economic surplus is then denied.

#### Increased real income

The free trade case would be powerfully reinforced if one could show that real income is probably increased by unrestricted commerce. And actually there are theoretical reasons

for supposing that the real rewards of productive factors will in general be augmented by free trade policies. In other words, a person supplying an acre of land, a day of work, or \$1,000 of capital will probably be able to command a greater quantity of consumer goods and services in return. This is equivalent to asserting that free trade will increase factor prices relative to product prices. Supposedly, the physical productivity of factors will be greater, and hence they will be more highly paid; and an enhanced volume of consumer goods will reduce their prices relative to rents, interest, and wage rates

The thesis that real factor rewards will generally be increased can be supported in various ways. The one presented here makes use of certain theorems presented in Chapter 5, which dealt with price determination for land and labor under different trade conditions in Argentina and Belgium. It will be recalled that the advent of unobstructed trade greatly benefited the landowners in Argentina and the workers in Belgium; however, we decided that the effect on workers in Argentina and on landowners in Belgium was uncertain.

Various statements in this connection were reduced to symbolic form. Specifically, we said that the worth of the marginal units of a specific factor, wherever employed, were always equal to one another and identical with the factor's price. Thus, in some one region,  ${}^m\Theta_d = {}^v\Theta_d = P_d$ . The marginal worth of a factor is equal to its marginal physical productivity  $(\phi)$  multiplied by the selling price of the good it helps to make. For example,  ${}^m\Theta_d = {}^m\phi_d \times P_m$  and  ${}^v\Theta_d = {}^v\phi_d \times P_r$ , and the competition of entrepreneurs should make both equal to the rent of land  $(P_d)$ . The same sort of relationships obtain for labor.

Free trade increases land rents in Argentina. The new commodity prices should be sufficient, in the absence of freight costs, to cause all land and labor to shift from vegetable growing into meat production. This means that a great deal more labor than land will be released from vegetable growing and will be embraced in old and new meat-producing combinations.

In these combinations land will be more scarce relative to labor than before. Consequently  ${}^m\phi_d$  will increase. The price of meat in Argentina  $(P_m)$  is also increased because of the strong demand of Belgium which is no longer thwarted by legal barriers. Therefore, the rent of land in Argentina  $(P_m \times {}^m\phi_d)$  must rise.

Only part of the labor supply in Argentina was used in meat production before free trade and the wage rate  $(P_r)$  was then equal to  ${}^m\phi_r \times P_m$ . Free trade increases  $P_m$ , as we have seen. However, as the ratio of labor to land in meat production has now increased, we can expect  ${}^m\phi_r$  to fall. Which of these opposing movements will prevail, one cannot predict.

The fortunes of the various factors are reversed in Belgium. Labor wages will undoubtedly rise because of the keen demand from Argentina for the products that require a great deal of labor to make. Labor's productivity in vegetable production will increase, and vegetable prices will rise. On the other hand, a relatively large amount of land will now be used in each vegetable-growing combination, so that the marginal physical productivity of an acre will be reduced. This will be somewhat countered, though, by high vegetable prices. If an acre contributes less to growing cabbages, its owner can be partly consoled by the high prices which vegetables now command, thanks to the Argentine market.

Free trade may depress the price of one factor, now used far more lavishly, but the lot of even this unfortunate factor is alleviated by the increased price of the product which it is now exclusively making. The scarcer factor benefits from a double boost. Not only does the price of the product rise but its productivity is enhanced by being combined in smaller proportions than previously. We can, therefore, expect the average price of factors to rise. In general, the upward pressures should prove stronger. This statement is not vitiated because one factor's price remains unchanged or even falls. It is seldom that all the items which compose an average move in exact conformity with it.

An average rise in factor prices in each free-trade region will increase their real rewards unless product prices rise proportionately. There is no reason for expecting this last to happen. In Argentina the falling vegetable prices counteract the rising meat prices; and in Belgium the rising vegetable prices are offset by the falling meat prices. Average commodity prices should not change, as far as we can tell. Actually, if we are entitled to hold any a priori expectations, they might be that product prices will fall. Free trade increases total production. Since the total stock of primary money would remain unchanged, and assuming that the total supply of bank credit was not sympathetically altered, this should compel a fall in the commodity price level. There is certainly no reason to believe that commodity prices have to rise.

A strong presumption exists that factor prices increase relative to product prices. People live on wages, interest, and rents. If there is a real increase in these rewards for aiding coduction, it follows that the real income of the community at large has been supplemented. Families will be able to enjoy more of the world's goods in exchange for the same productive contribution. This is made possible by allocating resources more effectively, and the resultant increase in well-being constitutes the strongest single argument for international free trade.

## Free trade as a special case of laissez faire

We have already seen that there is a widespread feeling that free trade results in a natural pattern of trade and that such a system is somehow superior on that account. The classical economists, aided by a number of special assumptions, did, in fact, erect an imposing edifice of theory which demonstrated the economic efficiency of laissez faire. The authors have also at times inclined to the view that resources will be best allocated if demand and supply forces are allowed to work themselves out in free markets.

However, this attitude can only be adopted with reserva-

tions. In a certain sense, there would be no natural pattern of international trade even if all governments refrained from regulating imports and exports because there have been so many other interferences with the economy, both by governments and private groups, that the flow of goods and services has already been channeled and diverted to a very considerable extent. We have already seen that there is a reallocation of resources whenever a government imposes a domestic excise tax on a commodity. The same sort of realignment of productive factors takes place each time legislation is passed that prohibits child labor, establishes a minimum wage law, guarantees a generous price to some class of producers, subsidizes power production, alters the basis for setting transportation rates within the country, or extends some costly service to businessmen free of charge. Trade associations and monopolistic combinations also modify the use of resources whenever they are successful in restricting output or raising price. In other words, the design of an economy would be far from natural, in the sense that demand and supply forces had sorted themselves out in some pre-ordained manner, merely because free trade policies prevailed.

Laissez faire has certainly lost much of its erstwhile popularity, at least in the domestic sphere, for here public opinion believes it has detected various abuses and defects, and governments have in turn attempted to apply remedial controls. Accordingly, we have food and drug laws, antimonopoly laws, taxes that discriminate against the rich, and so on. In a few instances it may well be that these domestic measures might be supplemented by means of a more intelligent interference with international trade than we endure today. There is often an element of inconsistency in simultaneously supporting a program of economic reform at home and free trade throughout the world

There are always some commodities which are deemed to be morally or physically dangerous, and whose production and use is, therefore, controlled. Examples are narcotics, salacious literature, foods which may be unclean, dangerous drugs, and all kinds of goods which may be carriers of pests or diseases. In all such cases an embargo on imports is an obvious supplement to other domestic controls. However, restrictions of this kind should be imposed only when there are substantial grounds for believing that the prohibited imports are genuinely harmful. Embargoes of this sort should not be allowed to develop into disguised and unjustifiable protection.

The simple truth is that free trade does have many of the same elements of strength and weakness as does a policy of laissez faire at home. Some of the abuses which creep into an uncontrolled free-enterprise system demand domestic regulation. And these measures of control can sometimes be supplemented by government intervention in the field of international trade. However, there are probably few instances of legitimate intervention, and one must exercise one's imagination to enumerate them. Even when used wisely, tariffs, embargoes, import subsidies, and so forth are almost always supplementary devices and are inadequate alone. Moreover, the proper kind of trade control will often be to encourage imports as a means, perhaps, of conserving natural resources or breaking up a domestic monopoly. It is all too obvious that the array of protectionist controls to be found on statute books today bears no resemblance to the selective controls discussed above. Any admission that government control of foreign trade might occasionally be desirable cannot be interpreted as a carte blanche approval of protection. Unrestricted enterprise both in foreign and domestic trade is still probably the best general policy for countries such as the United States.

#### Social Arguments Against Protection

Economic science is by no means responsible for all the objections levied against protection. Poetic justice has decreed that pleas for tariffs and quotas, so often based on the grounds of national defense, native ethos, or other sometimes evasive intangibles must withstand a number of onslaughts which are likewise social in nature. Three of the more serious of these

charges are that import obstruction tends to corrupt domestic government, disrupt national unity, and embitter international relations.

# Undermining domestic government

It cannot be repeated too often that a government grants a subsidy when it obstructs an import. One should not be surprised, then, if an investigation of how tariff schedules are built up tells a story of legislative lobbying. Almost every item in a tariff list records the successful use of pressure tactics.

The evolution of democratic government has taken many centuries and even today it flourishes in only a few countries. One of the principal objections to the other forms of government which it has replaced is that they resulted in economic discrimination. Kings used to dispense monopolistic privileges to their personal favorites. Oligarchies have existed to protect their own vested interests. We do not want any democratic government to become an instrumentality at the service of special interests. The ideal of self-government should not be prostituted in this manner.

Unfortunately, the possibility and existence of tariffs is partly responsible for the unhealthy state of political affairs to be found in many countries today. Tariff protection is one of the most important financial privileges which the state can grant. Consequently, the foreign-trade regulations of most central governments in peacetime have been manipulated for some selfish end. This has helped to set a pattern for other groups anxious to obtain privileges. The habit of catering to those organizations that can raise enough money to shout the loudest or push the hardest is becoming ingrained. True democracy should amount to more than government by clamor or pressure.

# Disrupting national unity

Frequently, certain areas of a country specialize in producing one or a few favored products. These regions naturally have special interests which often clash with those of

other regions within the same nation. The selfish struggles which ensue tend to disrupt national unity.

The recent tariff history of the Dominion of Canada furnishes an example of the strains and stresses that may develon. The provinces of Ontario and Quebec have long had more aspiring manufacturing ambitions than the unprotected Canadian market could sustain in the face of British and American competition. However, the voting strength lies in Ontario and Quebec, and so, by means of protection, the Canadian market was in large measure turned over to them. This Dominion policy has created especial hardship and ill-feeling in the Pacific Coast province of British Columbia. The output of this province's forests, fisheries, and mines cannot normally be absorbed by Canada. Moreover, the finished goods produced by Ontario and Quebec are usually less varied and higher priced than those of the United States. The system of imperial preferences, initiated by the Ottawa Agreements in 1932, provided little solace. Freight rates to and from the United Kingdom market depress received prices and raise paid prices for the people of British Columbia. Their prosperity, which should depend primarily on north-and-south trade with the United States, has been sacrificed to that of other parts of Canada. This continuing source of irritation has vexed a number of Dominion-Provincial negotiations and has to some degree disrupted Canadian unity.

Some countries suffer from this problem more than others. It is especially pressing when productive specialization is associated with geographical divisions. Various parts of a country may be concerned with only one or two products, the markets for which are mostly abroad, whereas other parts may make goods which by their nature must be sold in a more immediate vicinity. The contending interests can then be organized with greater ease, and the final clash will be more pronounced. It is interesting to recall that the American Revolution can be partly attributed to the attempts of a short-sighted king to impose an unnatural trade pattern on his empire. Political unity and economic realism must always march hand in hand.

#### Embitterment of international relations

When a tariff is raised against an import, the principal suppliers in other countries are confronted with either the loss of some of their business or the necessity of accepting a lower price. This is felt to be an affront, and insult will be added to injury should protection take the form of an embargo based on alleged danger to health or morality. To make matters worse, a very large percentage of most imported commodities come from one or two principal foreign nations. This concentrates the resultant ill will in a few countries, and, inasmuch as producers are politically dominant in most lands, retaliation is a probability. The same spirit may lead to successive countermeasures in return. Recourse may then be had to other kinds of economic discrimination against the goods and nationals of the unfriendly country: immigration quotas may be reduced or work permits denied; sometimes serious tension develops.

Political and economic relations between nations seem to improve and degenerate together. The French had every reason to object to the proposed customs union between Austria and pre-Hitler Germany, because they naturally suspected that this event would lead to political fusion. There is relatively little danger of war between countries that voluntarily become each others' best customers. On the other hand, arbitrary refusal to buy from a country is almost inevitably the cause or effect of diplomatic coolness. Normally, the relations of Argentina are much better with Great Britain than with the United States because the British buy Argentina's principal exports, whereas we prefer to exclude her fresh meats, and impose severe tariff barriers on other products.

The history of the Reciprocal Trade Agreements negotiated by the United States Department of State gives grounds for believing that important tariff and quota concessions reinforce good will. Today there is an increasing realization in America that the political accords which the United Nations have reached to promote peace must be supplemented by economic ties. Such ties can be bound tighter by following policies of

#### Why Is Protection So Extensive?

Readers are likely to suspect an author who blandly ignores the world of protection around him and continues to write that interference in international trade is valid only in rather exceptional circumstances. To some this may seem to be unduly theoretical and doctrinaire. But what is practiced is not necessarily desirable. The fact of war does not render peace an invalid aim. However, in order to satisfy the querulous and sceptical, let us explain why there are so many tariffs and quotas. The answer lies in the incidence of protection and the mechanics of politics.

A tariff or quota always benefits a particular trade or locality, such as business owners, workers with special skills, and perhaps material suppliers and local tradesmen. A change in the tariff law will vitally affect these people. The protected product may be their sole source of income. The style of living they can afford is contingent on the level of the customs rate. Moreover, the capital values of the specialized assets they own and employ in the protected trade are similarly dependent on the success of their political maneuvering.

For example, there is a very close connection between the American tariff on wool and the value of certain classes of grazing land in the United States. If wool were imported duty free, there would be a considerable fall in the price of wool, which would in turn reduce the gross revenue of sheep ranchers. Some of the productive agents employed by them could successfully resist any attempts to lower the prices they are paid. Most of the labor would move to other jobs and places rather than accept a wage cut. Equipment manufacturers would concentrate on the other farm implements they usually make. But a great deal of grazing land, especially if too wooded to run cattle on, has no alternative use. Much of this land might no longer be able to command a rent, and its capital value would

therefore be wiped out. A reduction in the wool tariff would not only slice the income of sheep ranchers but would also confiscate a large part of the wealth invested in grazing land. Under the circumstances it is not to be wondered at if sheep ranchers organize to exert stronger pressure on their congressmen.

On the other hand, the domestic injury inflicted by the wool tariff is spread wide enough almost to escape perception. The textile firms which buy wool are hardly affected because they pass on the inflated price when they sell. The consumers of wool products admittedly suffer, but the percentage price increase is lost to view behind the many other costs of manufacturing; besides, woolen goods are only one of a hundred-odd products which consumers buy in a twelvemonth. Nor do the users of wool goods have any capital assets at stake. These final consumers do not have sufficient incentive to organize, and they are too numerous and scattered to unite.

People sometimes wonder why consumers as a whole do not maintain a permanent lobby and continuous propaganda against all tariffs and quotas. Perhaps the wool tariff is an insignificant burden to consumers, but to this must be added such obstructions as the tariff on wheat, the embargo on Argentine fresh meat, the duties on cameras and electrical equipment, and so on ad infinitum. A wide range of commodities purchased by any American family are price-sustained by a tariff or quota. One might think that the aggregate loss to consumers would justify the expense of counterorganization. The practical difficulty, though, is that the political issue as debated by a legislature is never that of free trade versus protection for all commodities. Such controversy as there is usually centers at any one time around only a few items; some small group is always vitally concerned in these, but the general public is not, and so loses the contest by default. Nobody will take time to guard the general interest when other matters affect each of us more directly and vitally.

Congressmen, Members of Parliament, and other elected of-

ficials should not be censored too harshly. They are not intellectual giants and must be pardoned if they succumb to the principal arguments they are likely to hear-namely, those presented by the lobbyists who favor protection. Elected officials have limited means for testing public opinion and must be excused if they believe that the favorable letters and telegrams drummed up by special interests are a truthful reflection of public opinion. And most politicians need financial and organizational help if they are to win elections. Most constituencies are economically specialized, and so there are always some local trade associations or other organized groups resolved to elect a man who will secure or maintain protection for their commodity. This will be true, not just of one constituency but of all districts which elect legislative members. It is not surprising that these men will engage in logrolling when they assemble to pass tariff laws.

The existence of tariffs and quotas is not a proof of their desirability. It rather evidences the frailty of human nature and intellect. That so many governments practice a high degree of protection should occasion little wonder. This is but one of many mistaken public policies which may eventually be remedied by the spread of public education.

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# Chapter 20

# International Cartels

TARGELY as a result of the insidious practices of German cartels before and during World War II, the public has come to associate the term cartel with evil. But what are international cartels? (In the technical economic sense, international cartels are private or government-sponsored agreements between producers located in two or more countries but in the same branch of a trade, agreements which limit for monopolistic ends the freedom of these producers in the production and sale of their products. The limitation on the producers' freedom of action results in various degrees of monopoly-like behavior by members of cartels. That is to say, cartels usually endeavor to restrict the output or sales of members, to apportion market territories, to fix prices, and, in addition, often make agreements for the exchange of patents and secret processes.) In most countries of the world such monopoly-like behavior receives official government encouragement: in the United States, however, our traditional opposition to monopoly in all its forms, embodied in laws passed since the Sherman Anti-Trust Act of 1890, extends as well to the international cartel, except for certain prescribed types of concerted action permitted under the Webb-Pomerene Act of 1918.

The policy of foreign cartels of excluding American exports from some markets, and the conspiracies on the part of foreign firms to depress prices in the United States by avoiding competition in the buying of certain American export products, led to the passage of the Webb-Pomerene Act in 1918. This Act permits American companies to combine among themselves or

with foreign firms and organizations for the purpose of effecting exports from the United States. American firms have formed a number of export associations under the authority of the Webb law. Under this law, however, export associations are not supposed to be permitted to enter international agreements which violate the provisions of the Sherman Anti-Trust Act—that is, which restrain trade within the United States. The intent of the Webb law notwithstanding, there is ample evidence to indicate that American firms have combined with foreign firms in connection with purely domestic as well as export business. The problem of international cartels, therefore, is of particular interest in understanding several phases of American governmental policy. It is with the economic aspect of international cartels that we shall concern ourselves in this chapter.

There are two general facts that should be borne in mind in connection with international cartels. First, in a number of cases, production capacity in the industry prior to cartelization greatly exceeded the volume of current consumption of the products in question. As a result, firms were willing to sell at prices as low as prime cost in order to attract customers. In such cases, charges of ruinous price-cutting were heard. Secondly, operationally successful international cartels have usually required the effective prior monopoly-like association of producers in the domestic market. Cartels have not flourished in fields characterized by healthy domestic competition.

## Types of International Cartels

Although cartel organizations differ widely when analyzed in detail, international cartels may be classified into three general types. These are the association, the patent-licensing agreement, and the combine.

The Association. In many respects similar to the domestic (national) trade association which is engaged in restrictive practices, the international-cartel association has a membership consisting of producing companies located in several na-

tions. Such cartels may effect formal agreements to do any one or more of the following: (a) fix prices, (b) limit or apportion production, sales, or exports, (c) allocate market territories, (d) redistribute profits according to formula, and (e) sell through a special cartel sales agency. If the cartel controls a large proportion of the total world output and if members abide by the terms of agreements, such an association will have considerable economic power, provided that public sentiment is not opposed to monopolistic combinations. In the United States, however, firms are able to participate directly in cartel associations on a secret basis only, since the cartel agreement is not enforceable at law and participation is subject to legal penalty. American firms, however, may participate in cartel associations indirectly through export associations under the Webb-Pomerene Act.

The Patent-Licensing Agreement. Among the major manufacturing firms, particularly in the chemical, electrical, and petroleum industries, the most common type of international cartel is the agreement covering patents and secret processes. Since most countries grant the patent owner the monopolistic right to make and use the patented article, cartel arrangements may be based on the terms under which the patent owner assigns the patent or licenses its use to related industries in other countries. Moreover, as patents are granted on a country-bycountry basis, the cartel can invoke governmental power to enforce an allocation of territory (on the ground of patent infringement) in the event that independent firms endeavor to oppose the cartel. The terms of patent licenses may also contain provisions as to the prices at which the licensees may sell, the output that may be produced, the types of concerns through which the article may be distributed, and so on. By such terms noncompeting areas are established, assuring that the cartel achieves the desired degree of monopoly power. must not be assumed, however, that the full effect of patentlicense controls can be seen from the examination of individual patent licenses. The entire pattern of patent controls must be surveyed, for it is the complex interrelations of kindred patent agreements as found, say, in the chemical industry, which add strength to this type of cartel.

The Combine. The third form of cartel controls international markets not by contract but by uniting competitors under a common organization or management. Market control in this case is based on corporate structure. Thus, the major cartel units in two countries may carry on all of their business in a third country through a jointly owned subsidiary. For example, such industrial giants as du Pont in the United States and Imperial Chemical Industries in Britain have agreed to do business in Brazil and Argentina only through the Duperial companies in each of these two countries. The Duperial companies undertake local manufacture, and import the products of both parent concerns, apportioning the local market and eliminating price competition by means of their own sales policy. More important are the far-flung industrial combines based on holding-company structures, in which cartelization ramifies through a maze of corporate organizations as a result of contracts between the top layers of each such combine. For example, there is, on the one hand, the International Telephone and Telegraph Company, the parent company in a combine consisting of cable, radio communication, telephone, and equipment companies throughout the world; while there is, on the other hand, the large Dutch holding company of N. V. Philips engaged in the production of a variety of electrical goods in a number of countries. These two corporations and one or two other great companies can achieve world industrial cartelization by means of relatively simple contractual arrangements among themselves.

## Methods of Increasing Profits

The primary purpose of cartels is to increase the profits of members by reducing competition. Four distinct methods of achieving this purpose may be distinguished.

Direct Price-Fixing Agreements. The principal aim of in-

ternational cartels is to maintain prices at levels higher than would obtain under competitive conditions. Sometimes this aim is achieved by means of direct price-fixing agreements. Before a cartel agreement is reached and at times when cartel members are attempting to intimidate or discipline independents, a price war may be carried out to coerce rebellious elements in the industry. A distinctly different policy of sustained high prices is pursued during a period when the cartel's control is unquestioned. Cartels invariably attempt to prove that the latter price policy is necessary in order to prevent cutthroat competition.

The level of prices established by cartels after they are safely in control of the market varies from market to market in accordance with what the traffic will bear. Examples of the extremes to which prices may go under cartelization are provided by an analysis of the Department of Justice:

Tungsten carbide is a hard-metal composition of great industrial importance in cutting tools, extrusion dies, and wear-resistant surfaces. It was sold in the United States in 1927-28 at \$50.00 per pound. At that time General Electric and Friedrich Krupp Aktiengesellschaft formed an agreement by which their patents were pooled. General Electric was given control of the sale price in the United States, and Krupp was obligated to observe this price upon its imports. Thereupon the United States' price rose promptly to a maximum of \$453.00 per pound. During most of the 1930's the price range was from \$225.00 to \$453.00, and in 1940 the maximum price was still \$205.00 per pound. In April, 1942, after an indictment under the antitrust laws, the price ranged from \$27.00 to \$45.00 per pound.

The high price of certain dental plastics has been equally striking. As a result of cartel agreements among E. I. du Pont de Nemours and Company and Rohm and Haas Co., of the United States; and I. G. Farbenindustrie, Imperial Chemical Industries, and Rohm and Haas Co., of Germany, the two American companies participating obtained control of the United States market for acrylic products, including methyl-methacrylate dentures. This control was used to

<sup>&</sup>lt;sup>1</sup>C. D. Edwards, Economic and Political Aspects of International Cartels, Monograph No. 1, pp. 12-13 Subcommittee on War Mobilization of the Committee on Military Affairs, U. S. Senate, 1944.

fix prices upon dental plastics in the United States. Information is not readily available with which to appraise the basic price of 85¢ a pound which was used for the sale of methyl-methacrylate powders to commercial molders, but it is obvious that, if this price covered costs, nothing but the power of monopoly could account for the price of \$45.00 a pound which was charged in the sales of the same product for denture purposes to dental laboratories and dentists. The profits obtainable from the sales of methyl-methacrylate products to various types of customers by the du Pont Company were summarized by an executive in September, 1941. At that time the total investment in methyl-methacrylate manufacture at the Bell plant was \$986,000.00 and the net profit for the first six months of the year had been \$210,000.00.

Impairment of Quality. The monopolistic nature of cartels is such as to diminish the incentives to improve quality and to limit the ability of the buyer to protect himself against low quality. Dissatisfied customers in a certain territory have no alternative but to accept the product of the concern assigned to that territory. A superior product may be degraded or withdrawn in order to prevent it from displacing a product already established. The example of electric-light bulb manufacture in the United States is of interest. Under international cartel agreements, the American market has been reserved for General Electric and Westinghouse. Protected from foreign competition, these concerns have attempted to increase their profits by reducing the durability of their light bulbs. An interesting case of cartel-protected discriminating monopoly pricing is afforded by the agreement between the world's five principal producers of acrylic products. Under this agreement, which allocated the United States market to du Pont and the Rohm and Haas Company, it was found, as was indicated above, that a plastic material, methyl-methacrylate powders, was sold at 85¢ a pound to commercial molders but at \$45.00 a pound for denture purposes to dental laboratories and dentists. When some dentists discovered that they could effect a great saving by buying methyl methacrylate as commercial molding powder, the seller sought to prevent this "bootlegging"—that is, the substitution of the article sold at a low price for the article sold at the much higher price. It was decided to take advantage of the Pure Food and Drug Act, which forbids the use of deleterious ingredients in dental preparations. A very small amount of arsenic of lead, insufficient to spoil the molding properties of the methyl-methacrylate powders, was thought to be all that was needed to require confiscation of the "bootleg" powders.

Allocation of Trade Territories. The allocation of territories is another prevalent cartel practice. Cartel members agree not to sell in territory assigned exclusively to others, nor to sell to customers who are likely to export to such territory. As a rule, American members of the cartel enjoy an unchallenged position in our large domestic market, and sometimes the Canadian market as well. In return, they are often willing to sacrifice possibilities of export and investment abroad. Clearly, by such allocation of trade territory the cartels assume attributes of sovereignty, since the allocations amount to privately imposed limitations on the free flow of international trade. The practice also serves to limit the scope of the United States trade-agreements program (Chapter 26), since commodities subject to cartel control are generally excluded from the reciprocal reduction of trade barriers that is effected by the trade agreements. On the other hand, there are cases on record in which cartel action has served to increase the total volume of international trade. High cartel prices have attracted additional productive capacity into the market, making for greater exports than would otherwise have occurred. In Latin America, moreover, international cartels have prevented the installation of high-cost domestic capacity by threatening to cut prices in such countries. By this means, imports into such countries were maintained, as was the volume of international trade. It is worth noting, however, that the methods used to obtain these results are not adduced as a merit of cartelization by the proponents of cartels.

Before bringing this section to a close, a brief word may also

be said about the international phosphate-rock cartel. an American-French arrangement in which American firms participate under the authority of the Webb-Pomerene law. The latest cartel agreement dates from 1933, when the European market was divided on the basis of 16 per cent to the American group and 84 per cent to French North African producers. Prices were fixed for different markets from time to time. Elaborate machinery was set up to impose severe penalties on firms found guilty of violating price or market agreements. One of the outstanding features of the cartel was the agreement to discriminate in favor of the domestic market of the parties to the agreement as far as prices were concerned. Thus, the French producers were compelled by their government to sell in France at prices below the general European level, whereas the American producers regularly sold at lower prices in the United States than in their export sales. By means of its price policy, American firms were able to enlist the support of American agriculture and congressmen in favor of participation in an international cartel. That the savings to domestic agriculture were significant is revealed by the price data: in the export trade the average mine value of Florida land pebble (phosphate rock) increased from \$4.13 per ton in 1933 to \$5.38 in 1939, whereas the average mine value of a slightly different grade of product sold in the United States fell from \$2.33 per ton in 1933 to \$1.71 per ton in 1939. The industry contends that its high export prices make possible the low ones offered to American consumers. In consequence, it claims that a suspension of the cartel would necessitate lower export prices, and thus make necessary a higher level of domestic prices. This case represents one of the clearest examples of the discriminatory practices engaged in by cartels.

<u>Restriction of Supply</u>. The maintenance of prices by means of restrictions of the available supply is another common cartel device, particularly in the field of raw materials produced in the colonies of the imperial powers. Experience in the case of natural rubber is especially revealing on this score, as it

shows that government-sponsored cartels perform in the same manner as private cartels. Consider the International Rubber Regulation Agreement, to which the governments of Britain, Holland, France, and Thailand were signatories. By means of this cartel the price of rubber was raised artificially by output and export control from the low level of 3.4¢ a pound at the bottom of the world depression in 1932 to 19.3¢ in 1937 and to an average price of over 22¢ a pound in 1941. (Under the previous Stevenson restriction scheme, the price of rubber was pushed to \$1.03 in 1925.)

Competent observers have estimated that under conditions of production near capacity, a price of 8¢ would be adequately remunerative. The cartel occasionally used the language of "fair price." but it was really after monopoly profits. By controlling 98 per cent of the world's rubber supply, the cartel could easily raise prices by restricting supplies coming onto the market and thus mulcted consuming countries. Since American consumption exceeded half the world level, United States consumers suffered most from the exploitative manipulations of the cartel. Moreover, for many critical months in 1941 the cartel effectively delayed the United States Government's feverish effort to build up a war-emergency stockpile of rubber. This the cartel did by not permitting the efficient producers of the Far East to attain maximum production until two months before Pearl Harbor. Finally, it may be said that the cartel was a conspiracy of the foreign-owned plantations against the native producers. Thus up to the end of 1936 the exports of Dutch native producers were restricted by an export tax equal to five sixths of the price regarded as satisfactory for the average foreign-owned plantation. It was only by this means that Dutch native exports were kept within the quota established by the cartel.

Now that the United States has an ample supply of rubber from synthetic production, we need no longer be completely dependent on a cartel-controlled foreign source of supply. The existence of synthetic-rubber capacity should constitute adequate insurance against extortionate cartel prices. It may be of interest to note, moreover, that for the interwar period as a whole the United States probably paid the rubber cartel a sum in excess of a fair price for rubber sufficient to pay for the cost, at high wartime prices, of constructing our vast synthetic rubber establishment.

Cartelization of the tin industry through Anglo-Dutch control in most respects is similar to the cartelization of rubber. A few details concerning the cartel will be presented later in this chapter when we take up the pros and cons of international cartels.

The quebracho cartel also illustrates how foreign control of a vital raw material is used to mulct consumers in the United Quebracho extract, obtained from a tree which grows mainly in Argentina and Paraguay, is the world's principal vegetable tanning material. When applied to raw leather, a quebracho blend binds the relatively loose and fibrous composition of the leather in such a way as greatly to increase the pliability and wearing qualities of leather for shoe soles (particularly of the heavy grades necessary for military shoes), harnesses, and straps. In a period of leather scarcity, as during World War II, adequate supplies of quebracho are necessary if the maximum use is to be made of a short supply of hides. The quebracho cartel, however, succeeded in preventing the accumulation of an adequate wartime stockpile in the United States, which in turn caused a deterioration in leathers for general consumption at a critical period of shoe rationing. cartel's action served to raise quebracho prices directly, and to increase the effective price of leather goods indirectly by quality deterioration.

Quebracho is controlled by a relatively simple international arrangement. The parent concern is the Forestal Company of England, which, through the control of La Forestal of Argentina, regulates the bulk of South American production. Forestal of England also controls the American concern which imports 70 per cent of the quebracho entering the United States.

Prices set by this importing company are followed religiously by the only other American importer. The British company thus controls quebracho from the tree in South America to the American consumer. In order to weaken the pressure which might be brought to bear upon Forestal of England, the Argentine government, since February 1942, has imposed export quotas on individual producers in order to prevent a few independents from deviating from cartel prices.

It should be added that American skirts have not always been clean as regards cartelization in this general field. Copper Exporters, Inc., an American-dominated international cartel established in 1926 under the terms of the Webb-Pomerene law, employed devices similar to those used by the familiar Anglo-Dutch schemes, and with similar results. Controlling about 95 per cent of the world's output of copper, and with low stocks in consuming countries during this period of world boom, the cartel fed the market at a rate considerably below that which was required if a scramble for the metal was to be avoided. Prices reached excessive levels, with buyers' strikes being called during 1928-29. It is not surprising that there was much resentment against the American firms which dominated this cartel (by controlling production in Chile, Mexico, and Canada as well as in the United States).

#### Cartels and International Trade

Before considering the relationship between cartels and international trade, a necessary distinction should be made between two different types of international cartels from the point of view of motivation. In one type of cartel, members pursue their business ends without regard to the national interests of other nations or of the national policy of their own nation. As a general rule, American concerns, acting mainly for business reasons, fall into this category. In a second type of cartel, members consciously serve, willingly or unwillingly, the national purposes of a particular country. Often the two types are mixed, but as a group, German cartels have had a

notorious record along the lines of this second type. That is, they frequently adopted policies outlined by their government even when profit prospects were diminished thereby. Important as the distinction between these two types of motivation may be, however, individual cartels are more important in terms of what they have in common than in terms of their differences. This is clearly illustrated by the role played by cartels in international trade.

Cartels and Tariff Policy. (Cartel agreements often constitute private tariff barriers, imposed where national policy is opposed to such barriers or superimposed upon existing governmental tariff structures.) Take the case of the giant Imperial Chemical Industries, which controls almost the entire chemical industry of Britain. Its cartel agreement with du Pont recognizes the American market as the exclusive territory of the latter for all patented products, and in addition, du Pont. without contract, enjoys the benefit of being free from competition from Imperial Chemical Industries as regards many unpatented goods. In effect, therefore, this cartel agreement amounts to a privately imposed prohibitive tariff upon the importation of many British chemicals into the United States. (Some cartels, on the other hand, follow a policy of limiting or discouraging domestic manufacture. In so doing they of course seek ends the reverse of those sought by national tariffs.) Two examples may be cited. The quinine cartel, which controlled practically all of the world's supply of the raw material, obtained control of the American market before World War II by not allowing domestic manufacturers to make more than half of our national requirements of this important product. By requiring that the raw material (cinchona bark) be purchased exclusively from the Dutch-controlled cartel, the cartel was able to maintain a strong control over the only two American manufacturers that were permitted to make the product. Exports of quinine from the United States were forbidden, and the cartel bought up small supplies of noncartel-controlled cinchona bark in Latin America in order to prevent supplies

from going to possible independent producers in the United States. In view of the cartel's control, it is not surprising that the two American producers made no attempt to seek a tariff against imports of finished quinine. Similarly, the diamond cartel has labored to prevent the establishment of an independent diamond-cutting industry in the United States, except on a limited and temporary wartime basis. Although rough diamonds may enter the United States free of duty, stocks are carefully allotted to the trade so as to preserve control in the hands of the cartel. The quinine and the diamond cases illustrate how cartels arbitrarily alter the flow of international trade to suit their own interests.

Calthough cartels often impose their own tariffs or control production and distribution even when legal free-trade conditions prevail, individual cartel members may, nevertheless, seek to promote tariffs or to raise existing ones.) The reason for this is that individual members must jockey for position within the cartel setup, and a tariff may strengthen the hand of a particular member who is negotiating for a larger share of the cartelized pie. The words of the organizer of Imperial Chemical Industries, writing in 1927 when Britain was still predominantly a free-trade country, are of interest:

In negotiation, the man behind the tariff wall always has something with which to bargain, which the man in the free-trade country has not. Any one who has any practical experience of bargaining with continental producers knows that the first thing they say is: "You cannot export to our country, because we have a tariff. How much of your market are you going to give to us?"

(Tariffs are also desired because they afford protection to domestic members of the cartel against independent foreign firms which do not co-operate with the cartel. Finally, individual cartel members often seek tariff protection against other members of the cartel who undertake price wars as a disciplinary or retaliatory device.)

Cartels and Industrial Development. (Another way in which

cartels affect international trade is through the obstructions which they place in the way of industrial development, particularly in what are regarded as colonial markets) Thus, in 1940 Imperial Chemical Industries proposed the establishment of a soda-ash plant in Brazil, but it frankly limited its size to small dimensions as a means of preserving the cartel's control of that market. The alkali cartel's correspondence reveals that when Argentine groups, with ample capital, seemed interested in setting up a local plant, "it was considered good strategy to reduce prices for a temporary period." Similar devices have often been used in overpopulated India to defeat efforts to obtain infant-industry protection. When the Indians requested tariff protection for a new industry, cartels proceeded to establish small plants of their own, to operate these at a loss (absorbed by the cartel), and then to close down the plants when the cartel had convinced the tariff board that India did not need a tariff. To be sure, there are exceptions to the rule, as witness the steel cartel's favoring the establishment of the comparatively small Tata Steel Works in India.

#### The Pros and Cons

In some cartelized industries, notably in the field of agricultural raw materials and minerals, the principal objective is said to be relief from excess capacity. When competition is not relied upon to remove the excess capacity, other methods may be used. Among these are limitations upon imports, indirectly by means of protective tariffs, or directly by the use of import quotas. Export or production subsidies constitute another method. All three of these methods fall into the "beggar-thyneighbor" category, since excess capacity in any one country is removed only at the expense of an increase in the excess capacity of other countries. Cartelization is also a method of "adjusting supply to demand"—that is, restricting output for the purpose of removing excess capacity. What may be said in favor of international cartels on this score?

Pro. On the basis of experience with the control of tin, one

writer2 of prominence in this field has endeavored to make a case for cartelization as a means of meeting the problem of excess capacity. Substantial excess capacity in the tin industry. coupled with severe world depression, would have involved a fall in the price of tin to marginal prime cost. The latter is set at only about a third of the long-term marginal cost, including minimum profits, of a total world tin supply required for normal needs. Hence, it is estimated that without cartelization much of the production capacity needed for normal requirements would have been eliminated. But since technical progress was still continuing in the tin industry, new low-cost capacity would have been developed without a cartel, and soon there would have been excess capacity anew. In the absence of cartelization, therefore, a period of world depression and excess capacity would drive down price to a very low level, great capital losses would befall all save the lowest-cost firms in the industry, and profound social dislocations would occur in high-cost producing countries, such as Bolivia. But in depression the price elasticity of demand for tin is low, with the result that price maintenance through production restriction does not materially affect the quantity demanded. During world business recovery, however, demand becomes more elastic. It is at this stage that cartels should be weakened by price cutting on the part of the more efficient producers or formally dissolved. At this stage, lower prices for tin would constitute a stimulus to reviving activity in industrial countries, and resources in the tin industry would be more easily transferable to alternative uses because of the general recovery of world exports. The case for cartelization, based on the particular circumstances of tin, may be summarized as follows: When an industry is faced with the joint problem of excess capacity and a temporary slackening of demand owing to world depression. a policy of restriction is defensible on the grounds (1) that there is no destruction of capacity that is not economically

<sup>&</sup>lt;sup>2</sup> Rowe, J W F., in Elliot, W. Y. and others, International Control in the Non-Ferrous Metals, pp 70-80. New York: The Macmillan Co., 1937.

obsolete, and (2) that there are fewer economic and social disturbances in producing countries than would occur if the full force of competition were to prevail. As soon as world recovery has been achieved, however, the cartel can no longer be justified, as the excess capacity in the industry would then represent technically obsolete capacity; the maintenance of which should not fall upon consumers.

⟨ Two features should be observed about the above argument in favor of cartels. First, the conditions necessary for the validity of the argument limit the case for cartel restrictions to periods of severe world depression. Most cartels would have no reason for existence on the basis of this test. Secondly, the argument in favor of cartels is strikingly similar to the one advanced for the protection of infant industry. In both cases, restriction (of imports in the one case and of production and sales in the other) can be justified on a temporary basis. But just as it is unlikely to expect (as history shows) that industries will admit that they have grown up, so it seems unlikely to expect that restrictive cartels will not continue after economic depression has passed. The present argument for cartels rests on a tenuous basis if there is no assurance against additional price increases in periods of prosperous business.)

Con. (The arguments against international cartels are in essence the same as the arguments against monopoly.) It is well known that the degree of monopoly power possessed by various firms in the domestic market varies from case to case. The same variation is to be noticed in the restrictiveness of different international cartels or in the restrictiveness of the same cartel in different markets. Notwithstanding such circumstances, there can be no general justification on economic grounds for restrictive cartels. In the immediately preceding section, it was seen that the sole economic argument in favor of cartels breaks down at its most crucial point, at least as long as international cartels are not governed by impartial international machinery established to give primacy to the broad consumer interest. Since there is no justification in economic

analysis for cartels, we may state the case against them on economic grounds in the form of a summary enumeration of the objections explained in detail in earlier pages of this chapter.

(The principal economic objections are the following: (1) there is an impairment of the quality of commodities offered to the public, (2) international cartels charge monopoly prices, (3) cartels restrict the scope of international trade, and (4) they place limitations on the domestic economic development of many countries.)

# The Policy of the United States towards International Cartels

Although international cartels in the field of raw materials are largely foreign (British and Dutch) controlled. American participation in many cartels is by no means inconsiderable. As the world's greatest economic power, the United States has an important responsibility in connection with cartels. In view of the liberal trade policy which the United States espouses, it would appear that some means should be devised to penalize American membership in such monopolistic organizations: and we should also seek to eliminate the exploitation of our consumers by foreign-controlled cartels. Given the pervasiveness of monopoly forms in the American domestic economy, this will be no simple task. The problem will prove less difficult, however, if the campaign against cartels is pursued as a co-ordinated part of a policy of domestic high-level employment, since the basic excess-capacity argument used by cartelists will then carry less appeal than is usually the case. It must not be forgotten that economic resources are most readily transferable when general business activity is maintained at a high level.

The following program is proposed for the United States. First, the Webb-Pomerene Act of 1918, which permits firms to join *foreign* cartels through export associations, should be modified so as to weaken monopolies and combines in the

domestic market. Secondly, the United States should encourage co-ordinated international action by which each country undertakes to prohibit cartel practices that burden international trade. Particularly important will be action by an international convention or by national legislation to make more difficult the employment of patents, trade marks, and corporate organizations to achieve the ends of restrictive international cartels. Thirdly, programs involving the international regulation of trade or production should be the product of agreements by governments rather than private interests. Finally, if appropriate international action to curb cartels cannot be achieved the United States should consider the feasibility of attacking international cartels by unilateral action.

It is claimed by some that the United States will have to accept international cartels "because other nations accept them." The argument is that with much of international trade already cartelized. American participation in such restrictive agreements is necessary in order to maintain the volume of our exports. The available facts do not bear out this contention regarding the true scope of cartelized trade. It may also be said that the cartels are far from homogeneous with respect to their monopoly power. Cartels vary in strength from watertight monopolies to relatively ineffective restrictions on trade. Finally, to the extent that foreign cartels serve to raise prices in foreign markets, excellent competitive opportunities are offered to American enterprise to capture business through low prices based on efficiency. In other words, there is no reason why the United States should not win a larger share of foreign markets by outright competition than by means of restrictive agreements.

On the other hand, there are real dangers to the American position if cartels increase the influence they exert upon their governments, principally in the form of raising tariffs and placing direct restrictions on American goods. If a growing proportion of the trade of the world is cartelized, and America

follows a policy of nonparticipation in cartelization, we will be buying many of our imports at monopoly prices and selling our exports at more or less competitive prices. The terms of trade will be turned against us. What are the means by which we can combat such practices?

First, the government can deal with the problem through the usual international diplomatic bargaining process. In the second place, the United States can amend its Constitution to legalize the use of export taxes in order to inflate the prices of some of our exports, and thus extract from cartel-practicing countries a part of the excess price charged on cartelized sales. Thirdly, we can apply pressure by encouraging the use of synthetic products. Fourthly, we can threaten to make use of our unrivaled subsidy power if other means are not adequate to restore fair dealings on the basis of competitive and quasi-competitive practices. It is thus clear that, if necessary, the United States is in a strong position to exert a healthy competitive influence upon the world as regards international cartels.

But the United States has international economic obligations to discharge as well as international economic rights to defend. First, unrestricted competition may lead to a rapid exhaustion or wasteful exploitation of irreplaceable resources. In some instances a case can be made for restriction in order to achieve a better use of the world's wasting resources. Secondly, in its fight against cartels the moral position of the United States will not be strong if something like a successful high-level domestic employment policy is not realized. Cartels are objectionable basically because they make for an incorrect use of resources. The transfer of resources from line to line and from country to country can be achieved smoothly only if business activity and employment is maintained at high levels in the major industrial nations of the world. follows, therefore, that an anticartel policy should be pursued simultaneously with an appropriate employment policy.

#### Summary

Under American law cartels, like all other monopoly or monopoly-like devices to restrain trade, are declared to be illegal. The Webb-Pomerene Act of 1918 was enacted to enable our exporters to combine for protecting themselves against cartels which had operated to injure some of our export trade. The Webb law permits American firms to combine in connection with purely foreign-trade business, and a number of export associations have been established under the terms of this legislation. These associations have not operated without intensifying the domestic monopoly problem, however, and steps should be taken to curb their activities and influence in this regard.

Three broad types of international cartels were discussed and illustrated. These were the association, the patent-licensing agreement, and the combine. Although their restrictive practices take numerous forms, it was pointed out that these forms may be reduced to four kinds: direct price-fixing agreements, the impairment of quality, the allocation of market territories, and restriction of supply. The consumer interest is sadly neglected in the operation of these kinds of cartel practices.

In the field of trade policy, it was shown that international cartels generally establish trade barriers that overlap and conflict with the tariffs of sovereign states. These private organizations thus usurp attributes of sovereignty, often with the consent of some governments. (But the governments see to it that it is some other nation's sovereignty and not theirs which is thus affected.) Related to the trade-barrier case is the practice of international cartels in thwarting international development in order to preserve or increase their own economic position.

With respect to the pros and cons of international cartels, we saw that there is some justification for the practices as typified by the tin cartel, provided that they were employed solely as an antidepression weapon. Like the infant-industry case for

a tariff, however, there is every reason to believe that cartel practices will be continued long after they have lost their economic justification. We are left, then, with the charge that cartel devices are unregulated monopoly or monopoly-like practices and thus contrary to time-honored principles of welfare.

International cartels are especially obnoxious in the United States because of the liberal-trade philosophy which our government espouses. We indicated the major lines of action that might be taken to combat cartels, but we also emphasized that the United States has international obligations and responsibilities as well as rights. Outstanding among the responsibilities is that of maintaining high-level domestic employment, since it is only under the flourishing trade thus made possible that the transfer of resources out of unprofitable lines will involve a minimum of disturbance and dislocation. There are few, if any, grounds on which to defend cartels under conditions of flourishing world trade.

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# Chapter 21

# International Commodity Agreements

The present chapter is concerned with an area of discussion which is closely related to that of international cartels. We shall consider the details of the two international commodity agreements about which most is known, the wheat agreement and the inter-American coffee agreement. Then we shall take up the broader economic aspects of commodity agreements. The interesting question of the distinction between international commodity agreements and international cartels will concern us at the end of this chapter.

# The International Wheat Agreement

Among existing commodity agreements, the reader probably will profit most by taking a good look at the International Wheat Agreement of July 1942. This agreement, though still to be completely implemented, is a contract between four wheat-exporting countries, Argentina. Australia. Canada. and the United States, and one importing country, Great Britain. It is to be binding until two years after the war with Japan or until a broader international agreement is reached. The principal provisions of the agreement cover the following seven points:

Export control
Production control
Reserve stocks
Prices
Relief pool
Expansion of trade
Voting

Export Control. The latest estimate of the total volume of international trade in wheat and flour, less the export quotas established for nonsignatory exporting countries, will be divided among the four exporting countries in the following percentages: Argentina, 25; Australia. 19; Canada, 40; and the United States, 16. Since the four contracting countries export the great bulk of the wheat moving in international trade, the percentages indicate the approximate distribution of the permissible world export trade in that commodity.

Production Control. The four exporting countries pledge themselves to control production, by various means, so that annual output is sufficient only for (1) domestic requirements, (2) basic export quotas, and (3) maximum reserve stocks (indicated below).

Reserve Stocks. Each of the four countries pledges itself to ensure that stocks of old wheat, at the end of their respective crop years, do not fall below or exceed the following totals, in millions of bushels: Argentina, 35-130; Australia, 25-80; Canada, 80-275; and the United States, 150-400. In general, stocks in excess of the maximum are to be disposed of (by sale as feed or other lower-order uses) within the country.

Prices. Each August, a basic minimum and a basic maximum world export price is to be set for the next year, and sales are not to be made above or below such prices. The prices fixed shall "(a) return reasonably remunerative prices to producers in exporting countries, (b) be fair to consumers in importing countries, (c) be in reasonable relationship to prices of other commodities, and (d) make appropriate allowance for exchange and transportation costs." The reader will note the vagueness of the standards established for the determination of prices.

Relief Pool. The five countries agree to contribute without compensation a pool of 100 million bushels of wheat for distribution in war-stricken and other ravaged areas. If necessary, the four exporting countries are prepared to add more at a later date.

Expansion of Trade. The contracting governments undertake to help wheat-importing countries increase their imports of wheat by means of the reduction of their own and other tariff barriers on goods exported by wheat-importing countries.

Voting. Each country is given one vote. A two-thirds majority is required for approval, except that price decisions must be unanimous.

The present Wheat Agreement is an outgrowth of one set up in 1933, which operated for about a year. An unwillingness to make the necessary production and tariff-plus-quota adjustments in the midst of the world depression spelled the doom of the earlier agreement.

As far as the United States is concerned, the present Wheat Agreement in all probability will involve the continuation of a formal two-price system for this commodity apart from the fact that an export subsidy on wheat was inaugurated late in 1944. First, the United States has agreed to sell its export wheat at prices established by the five contracting countries. In view of an expected return of world wheat surpluses, it is unlikely that importing countries will accept anything like an American price for wheat that is supported at levels appreciably above that of the world market. Secondly, the United States was pledged by law to maintain prices to wheat growers at home, by means of loans without recourse, for two years after World War II at 90 per cent of official parity. The United States will thus join such outstanding agricultural countries as Australia in having two prices for one and the same commodity. Australia has long practiced such a policy with respect to many agricultural products. In the case of sugar this policy has involved selling to her own people at as much as seven cents a pound so that surplus sugar might be sold in the world market (mainly to the United Kingdom) at under two cents a pound.

Higher prices for home-grown wheat for domestic consumption, as well as export subsidies, are consistent with the terms of the Wheat Agreement, provided that large surpluses do not

hang over the market year in and year out. But the adjustment of production to accord with cost-price considerations is neglected—we shall be maintaining inefficient production If the Wheat Agreement is carried out successfully and the United States maintains an abnormally high wheat price for domestic consumers, the resulting situation will be the concern mainly and directly of the United States. One section of the community will be supported in part at the expense of the rest of the community. In a larger sense, however, it represents a policy which is inconsistent with the proper behavior of a creditor nation. In other words, if a creditor nation encourages exports by artificial means, debtor countries will find it successively more difficult to honor their contractual-interest and sinking-fund obligations to the creditor. A creditor country should shape its policy so as to encourage, rather than to discourage, the repayment of loans.

To the extent, moreover, that the United States employs export subsidies, whether in connection with commodity agreements or not, there will be a serious inconsistency in our existing commercial policy aims. The Tariff Act of 1930, which, together with amendments, is the basis for most of our existing commercial policy, specifically objects to export subsidies with respect to dutiable goods exported to the United States. If an export subsidy is found to be involved in the case of dutiable imported merchandise, the Treasury is required by law to impose offsetting (countervailing) customs duties on such merchandise. The moral basis for such treatment is obviously weakened if the United States itself also employs the device of export subsidies.

# The Inter-American Coffee Agreement

A second commodity agreement that may be considered is the Inter-American Coffee Agreement, originally signed in November 1940, and still in existence. This agreement establishes a relatively large import quota for the United States, which normally is a market for about one half of the world's coffee; specifies how much of this quota is to come from nonsignatory countries; and divides the rest (the great bulk) among the South and Central American countries. When the Agreement was adopted in 1940, the large continental-European market had been lost owing to blockade. Coffee prices had reached the lowest levels on record. Had the Western Hemisphere producers actively competed for the remaining market in the United States, prices might have declined to even lower levels than obtained in 1940. Moreover, the balance-of-payments position of coffee-producing countries was not encouraging. And the defense policy of the United States required a measure of economic as well as military security for our southern neighbors. It was decided, therefore, to eliminate the need for active price competition for the American coffee market. That the procedure was effective in this sense is indicated by the nearly 100-per-cent increase in the price of coffee during the first year of the agreement. That the Latin American coffee-producing countries were appreciative of this assistance from the United States is not surprising when it is remembered that this single commodity shapes the economic life of half a dozen nations: it accounts for 30 to 90 per cent of all exports of Brazil, Colombia, Costa Rica, Guatemala, Haiti, Nicaragua, and El Salvador, Finally, prices to consumers did not reach excessive proportions by the time our wartime ceiling prices were established.1

The Inter-American Coffee Agreement is noted less as a mechanism for ensuring better prices to producers than as a mechanism for protecting the consumer interest. The agreement was clearly dominated by the United States, the consuming nation, mainly because of the wartime situation with

<sup>&#</sup>x27;Indirectly, however, the effective price was increased when the Commodity Credit Corporation absorbed added costs on account of war-risk and marine insurance, ocean freight surcharge rates, and 75 per cent of inland freight costs traceable to steamer deviations to Gulf ports. Later, when coffee rationing was instituted because of a shortage of shipping, and coffee consumption was reduced below the quota level, the Commodity Credit Corporation purchased the entire unshipped portion of Brazil's basic quota for the coffee year 1942-48.

respect to markets and shipping. The formula used to protect the consumer interest is simple but effective. In order to decrease the total quota, and so help to increase prices, it is necessary to have the assent of all the votes. It is possible to increase the quota, on the other hand, if only one third of the votes are cast for such a purpose. Under the agreement the United States has the right to cast a third of all votes. It can, therefore, prevent action by Latin-American producers injurious to the consumer interest. Whether it will always act in behalf of consumers, however, is another matter. "Coffee diplomacy" as practiced by producing countries in Latin America can be a difficult thing to contend with.

Since the coffee producers have a strong position under the agreement, even though the United States retains the main veto power, the important question is whether or not the agreement can be trusted not to set an excessive price for coffee. Can the United States, as the only importing country included in the agreement, prevent its Good-Neighbor bias from allowing undue increases in prices? Undue, that is to say, both in terms of the interests of consumers and of the shortsighted producers. Coffee surpluses have been chronic in the major producing country, Brazil. Brazilian output from 1941 to 1944, however, was about 40 per cent below prewar levels because of adverse weather. This decline was approximately equal to normal European consumption. The result as of late 1944 was that producers and traders in exporting countries. anticipating the opening of the European market, began to speculate for a rise in prices by withholding supplies destined for the United States. To be sure, costs had been creeping up on price since 1941, owing mainly to local inflation. The organized coffee producers ran advertisements in American newspapers stating that an increase in price of but 1/8 of a cent per cup of coffee would take care of the situation. of a sip of the beverage, the requested increase would have been infinitesimal!) Actually, the requested increase in price was of the order of 30 per cent of the average price to producers.

During the fall and early winter of 1944, the maintenance of the American ceiling price on coffee without the reimposition of rationing was achieved only by an informal temporary arrangement with Brazil. By means of this arrangement Brazil undertook to make large monthly exports to the United States from government-controlled supplies in return for a promise from the United States not to increase the total quota. The experience of 1944 showed that the Inter-American Coffee Agreement, by fixing the amount which each producing country is enabled to export to the United States, removed the normal competition between different sources of supply and induced each of the producing countries to join in any movement to foster higher prices. Moreover, the temporary Brazilian arrangement proved unsuccessful as far as releasing private stocks was concerned. It was necessary for the Inter-American Coffee Board to double the quotas for imports of coffee into the United States during the first quarter of 1945 in order to offset the withholding of supplies by private holders of coffee in Brazil. We see, therefore, that this agreement clearly illustrates one of the difficulties likely to be encountered in commodity agreements of the fixed-quota type. In addition, it may be pointed out that if a permanent coffee agreement is to be reached, it will be necessary to modify the present arrangement to make room for provisions designed to remove the fundamental causes of discoulibrium in the coffee industry.

The wheat and the coffee agreements illustrate the character of commodity agreements and some of their advantages and limitations. There have been other agreements of the same general type in sugar, beef, and tea. We are likely to see the extension of this form of international agreement to cover commodities such as cotton, rice, rye, and cocoa.

If commodity agreements are not to deserve the stigma that attaches to cartels, it will be essential that they be operated so as to afford expanding market opportunities for the more efficient world producers at the expense of the relatively less efficient producers of the same commodity. The mere substitution of governmental agreements for private agreements will not be enough, as witness the exploitative governmental cartels in rubber and tin and the difficulties arising under the Inter-American Coffee Agreement.<sup>2</sup> Commodity agreements should be but a vehicle facilitating the ever-present adjustment process. Throttle the mechanism of adjustment, and the arrangement, whatever it be called, will amount to a cartel of the usual sort. Adequate representation to the consumer interest should help, however, to secure the necessary adjustment.

# Agreements and the Adjustment Process

Let us discuss briefly some aspects of the adjustment which it should be the purpose of commodity agreements to facilitate. (In the first place, each agreement should involve acceptance of the principle of comparative advantage by signatory countries.) This principle should be implemented on the basis of expert study of each commodity. It will not do simply to say that implementation will automatically occur if there is a lowering of trade barriers. ( Secondly, in the case of commodities subject to chronic surpluses, such as sugar, coffee, cocoa, and wheat, limitations on production should take the form, not of the usual uniform-percentage reduction measured from some historical base, but of a highly selective curtailment. Efficient producers will still be able to carry on profitable production in the surplus commodity. They should not be subject to the same degree of curtailment as the very inefficient.) (And curtailment in one direction should be accompanied by the substitution of other products according to a broad plan)

(In the third place, basic adjustments will be facilitated by appropriate action with respect to prices.) If the price should be fixed in commodity agreements, it should be pegged at a

In addition to the matters mentioned earlier, it may be pointed out that Brazil introduced a system of large export subsidies on coffee in 1945, and thus increased rather than reduced the tendency toward chronic surpluses of the product. The government was skillfully driven to take this action by the work of speculative interests in that country.

level which will make supply balance demand over a period of a half-dozen years or so. In years of large supply relative to demand, the commodity will move into storage; in years of short supply, there will be withdrawals from storage. Since the balancing of supply and demand will take place over a sixto eight-year period, average stocks will be larger than in the past. In the past, stocks have been too low because of the instability of prices and the great risks resulting from such instability. A greater measure of price stability will materially reduce the risk involved in the holding of large stocks. Producers, moreover, will benefit by not over- or under-planting in response to marked fluctuations in prices.

The big problem, of course, will be that of finding the correct price, the price that will clear the market of the volume produced over a six- to eight-year period. First, any historical price that might be selected is peculiarly associated with the particular circumstances of the year in question. In addition. the correct price is subject to the changing conditions of supply and demand, as well as to the cumulative effects of depression and prosperity. Third, the psychology of producer groups must be considered. The influence of such groups is to seek stabilization upwards, pressure being brought to raise prices above their correct level in periods of prosperity in order, let us say, to recoup some of past losses. The danger is that commodity agreements may degenerate into devices for lifting prices instead of stabilizing them. Only an articulate consumer interest can be relied upon to prevent incorrect pricing. That the mere fact that a country produces only a small fraction of its needs is no guarantee of a strong consumer interest is indicated by some recent British experience. British representatives on the Beef Agreement have favored higher prices than those of the meat-exporting nations, such as Argentina and Australia, because British home-cattle interests have a strong voice in affairs. Unless the pressure of powerful producer groups can be offset, the real international objectives of commodity agreements may not be realized.

# Commodity Agreements and Cartels Compared

International commodity agreements are closely related to government-sponsored cartels. Commodity agreements generally cover agricultural products customarily produced for export by the world in quantities exceeding normal worldimport demands. Unlike private cartels, intercountry commodity agreements are arrangements entered into by governments binding large numbers of independent producers who would not otherwise be able to band together to carry on restrictive practices. Unlike the government-sponsored cartel such as that in natural rubber, the commodity agreement (1) usually gives consumer interests an important voice in the determination of supply and price policies and (2) seeks to avoid the mere restriction of output and bolstering of prices without removing the basic causes of disequilibrium. It will thus be seen that intercountry commodity agreements differ greatly from private international cartels, but that the difference is tenuous when the comparison is with the government-sponsored cartel. In fact, if the international rubber cartel, for example, had given an important weight to the wishes of at least the major consuming country (the United States), the restrictive controls would no doubt have been far less severe. Rubber control might have been classified in the category of commodity agreements if the influence of the consumer interest had prevented prices from rising appreciably above long-run marginal cost. During the 1930's, however, the Anglo-Dutch rubber cartel maintained prices on the average at about twice the proper economic level. The line of distinction between government-sponsored cartels and international commodity agreements therefore turns upon the relationship between price and cost. If the arrangement is designed to maintain a close relationship between price and long-term marginal cost, and this design is indicated by the assignment of a positive role to the consumer interest, the arrangement falls into the category of a commodity agreement. If not, it must be classified as an international cartel even though it may formally be known by the seemingly innocuous term of a commodity agreement. The distinction, though tenuous, is both analytically significant and important in practice.

## Summary

International commodity agreements may differ from cartels only in name, and unless (1) a substantial representation is granted to the consumer interest and (2) production adjustment is emphasized, the two types of arrangements are fundamentally the same. We considered two examples of commodity agreements, the commodities involved being wheat and coffee. Apart from the technical features of each agreement, we saw that export subsidies were used by major exporters of both commodities. Export subsidies, however, represent a perversion of the very adjustment process which should be a central feature of commodity agreements. This is particularly true of export subsidies granted by creditor countries.

In order that the adjustment process may be facilitated, international commodity agreements should involve the acceptance of the following: (1) the principle of comparative advantage in production and a desire to implement this principle, (2) the selective curtailment of production in all countries having chronic agricultural surpluses to the end that the most efficient producers in each country be restricted least, or not at all, and (3) the principle that the price agreed upon should be such as can reasonably be expected to clear the market over a period of six to eight years. An articulate consumer interest is needed if the pressures exerted by producer groups are to be offset.

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# Chapter 22

# World Shipping

In the field of international economic policy, a perennial topic is what to do with national maritime policy. What should be the size and composition of a given country's merchant fleet? And what should be the government's policy toward its merchant shipping? These questions not only crop up in American discussion, but the topic of American merchant-marine policy is often a source of lively debate among informed people in those foreign countries which have a heavy economic stake in shipping. It should be well worthwhile, therefore, to provide the American reader with a brief treatment of the economics of world shipping.

# Importance of Shipping to Different Countries

Shipping varies greatly in importance as between the different countries of the world. One way to indicate the importance of shipping to different nations is to show how the countries rank in terms of the tonnage of shipping which flies under their flag. This is done in Table 27 below, where the major maritime nations are ranked in the order of gross tonnage on the eve of World War II. (The gross ton which is used in measuring shipping tonnage equals 100 cubic feet of enclosed space in a merchant ship.)

The foregoing table, which ranks shipping nations according to the size of their merchant fleets, is only a superficial index of the national importance of shipping. It does not indicate the relative importance of shipping to different national economies. The idea of relative importance may be illustrated

TABLE 27

OCEAN-GOING SHIPPING TONNAGE IN 1939 • (in million gross tons)

Norway Germany Italy		8.1 <sup>6</sup> 5.6 4.8 4.5	France	1.8 1.6 1.3 1.2 2.0
	Total for w	orld	65.2	

Source League of Nations, World Economic Survey 1989-41. Geneva, 1941. The above figures include tonnage engaged in both domestic and foreign shipping. About two thirds of the American tonnage was engaged in the domestic carrying trade before World War II.

<sup>b</sup> The American merchant marine aggregated some 50 million gross tons at the

end of 1945.

by using a domestic example. North Dakota may rank well down the list of states producing wheat, but if it is less diversified agriculturally and industrially than the wheat-producing states which outrank it, wheat may have great relative importance in the economy of the state. A greater fraction of North Dakota's annual income may be derived from wheat than in the case of the states which have a larger annual output of the commodity.

If we look at the available facts, it is pretty clear that the relative importance of shipping to different nations is not revealed by the table, which ranks nations in terms of the size of their merchant marine. It would be interesting to attempt to show the contribution of national shipping to national income, but the facts at hand do not enable us to indicate such a relationship. The best we can do with the available facts is to relate net shipping income, the excess of receipts from freights, port fees, and so on over payments for like items to foreigners, to income from merchandise exports. Merchandise exports are almost invariably the largest single item among a nation's current-account credits, so that a comparison of the yield from shipping with the return from commodity sales

abroad should give a good index of the relative importance of shipping. The results are shown in Table 28.

#### TABLE 28

NET SHIPPING INCOME AS A PERCENTAGE OF MEECHANDISE EXPORTS FOR SELECTED COUNTRIES\* (based on data for period 1938-38)

Norway	45.7
Great Britain	. 87.4
Denmark	
Netherlands	
France	
Greece	
United States (net nev	ment)

a Source: Compiled from data in League of Nations, Balances of Payments, 1938, Geneva, 1939. Japan and Italy, for which data are not available, were also nations with relatively important merchant shipping.

Ranking fourth in size in 1939, Norway occupies first place as far as the relative importance of shipping is concerned. This country's net shipping income is almost half as large as the income from merchandise exports. Although several important maritime nations are not included in Table 28, for want of data, it is also clear that Great Britain occupied second place, with net shipping income well over a third as great as the yield from exports. At the other extreme, however, is the United States. Second on the list in terms of size of merchant fleet, the United States is at the bottom of the list when net shipping income is compared with export yield.

Should the United States take steps to change the more or less regular net shipping payments to net shipping income, so that its condition is "brought into line" with the relationship which is found to exist in the case of most of the countries shown in Table 28? The answer is clearly in the negative. There is no reason why the relative importance of shipping income, any more than the relative importance of petroleum production or lace handkerchiefs, should be uniform or approximately uniform as between nations.

Moreover, the whole matter is intimately tied up with the

thus, for example, before World War II cheap British and German coal was available on the same terms to the vessels of all flags calling at British and German ports for bunkers.

A word should be said about the importance of operating It is popularly assumed that salaries and wages of seamen bulk very large and are therefore of overriding significance in shaping international competition in shipping Wages are important, but not to that degree. Wages of seamen on American cargo vessels average something in the neighborhood of 15 to 20 per cent of operating expenses. They are even less when capital and nonoperating expenses (for example, taxes) are included. But operating expenses are only a part of the picture; high-wage countries also have excessive construction costs as a general rule, so that operators in such countries are likewise handicapped with high capital costs. In the case of the United States, it is possible that the techniques employed in wartime ship construction, such as prefabrication of parts for assembly and other mass-production methods, may serve to reduce the familiar wage handican. But so favorable an outcome cannot be taken for granted.

# American Merchant Shipping: Historical Sketch

The history of the American merchant marine has been marked by considerable ups and downs. Our shipping expanded rapidly during the Napoleonic Wars, when our position as a neutral provided us with important temporary advantages. We became a top-ranking shipping nation. The position which United States shipping achieved, however, was not mainly the result of the war emergency of this period. Basically, our shipping developed rapidly because of natural superiority. We had a marked comparative advantage in ship construction, and Yankee clipper ships became world-famous for their speed and grace. The performance of American vessels was such that shippers of other nations paid premium rates to take advantage of the speedy service offered by our ships.

American superiority in shipping during this early period was the result of several factors. First, in this era of wooden ships large supplies of excellent timber and other materials were available along the North Atlantic coast. Secondly, this region was relatively poorly endowed for agricultural purposes, so that returns from shipping were comparatively more attractive than in regions farther south and west. Thirdly, immigrants experienced in shipbuilding settled in New England and enabled the new industry to develop rapidly on the basis of an adequate supply of skilled labor.

The industry developed to such a point that by 1820 about 90 per cent of American foreign commerce was carried in American vessels. Total gross tonnage of our merchant fleet amounted to 1.5 million tons in 1850, and reached a peak of 2.5 million tons in 1860. The Civil War, however, marked the end of America's prominent position in world shipping. A factor responsible for the decline was the Confederate preving on Union ships, but the main reason was the revolution in shipbuilding. Iron ships replaced wooden vessels, and steam propulsion took the place of the sail. American costs were higher than in England in the case of iron vessels because coal and iron were then more costly at seaboard than in England. This cost situation was in sharp contrast to the comparative position during the heyday of the clipper ship. It was only natural, therefore, that countries with more efficient shipping should take the lead. American ships, however, still had a monopoly of coastwise and interior shipping.

By 1914 the American merchant fleet used in foreign commerce had declined to about 800,000 gross tons, a reduction of two thirds from the level attained in 1860. What is more, this merchant marine carried only 10 per cent of our foreign trade. On the eve of World War I, therefore, this country found itself in the awkward position of being almost completely dependent upon foreign shipping for the carrying of its foreign trade. Great concern was shown throughout the nation when, in 1914, foreign ships on which we depended were withdrawn from

peacetime routes for use in naval and military services. Our commerce was seriously disrupted by the sudden turn of events, goods piled up on the docks at major ports, and by 1916 ocean freight rates skyrocketed to as much as 1,000 per cent over the 1914 level. The situation left a deep impression upon the people and upon Congress.

The need for a national merchant marine was clear to all. As a first step, the Shipping Act of 1916 established a Shipping Board to construct, lease, and operate vessels for use in our foreign trade. Under this program the merchant fleet reached a peak of 2,500 vessels aggregating eight million gross tons After the war there were several acts of legislation designed to promote American shipping. The Merchant Marine Act of 1920, for example, proclaimed that the country should have a merchant marine adequate for national defense, and provided a revolving construction loan fund of 125 million dollars. Private capital, however, was not anxious to construct merchant vessels in the light of high American costs. It was not until 1928, when the Merchant Marine Act of that year was passed, that further steps were taken to encourage private shipping in foreign trade. This act doubled the size of the construction loan fund and, for the first time in many decades. introduced the device of special shipping subsidies for vessels in foreign trade. Small indirect subsidies, intended to offset some of the greater cost of constructing and operating vessels of United States registry, were provided in the form of special mail contracts.1 Even this aid did not prove sufficient to develop an adequate merchant fleet. By 1936 the size of the United States merchant marine operating in foreign trade was under 400 vessels aggregating a little over two million gross tons. American shipping was in need of far greater stimulus than had been provided up to that time.

This stimulus was provided under the terms of the Merchant

<sup>&</sup>lt;sup>1</sup> Subsidies in one form or another have been granted from the early days of the nation. Thus, all coastwise traffic of the United States has been limited to American vessels since 1817.

Marine Act of 1936. According to the "declaration of policy of the act":

It is necessary for the national defense and development of its foreign and domestic commerce that the United States shall have a merchant marine (a) sufficient to carry its domestic water-borne commerce and a substantial portion of the water-borne export and import foreign commerce of the United States and to provide shipping service on all routes essential for maintaining the flow of such domestic and foreign water-borne commerce at all times, (b) capable of serving as a naval and military auxiliary in time of war or national emergency, (c) owned and operated under the United States flag by citizens of the United States insofar as may be practicable, and (d) composed of the bestequipped, safest, and most suitable types of vessels, constructed in the United States and manned with a trained and efficient citizen personnel. It is hereby declared to be the policy of the United States to foster the development and encourage the maintenance of such a merchant marine.

A system of extensive subsidies was introduced in order to make possible the realization of the objectives of the foregoing policy. Whereas previous subsidization covered only a part of the operating handicap of American shipping companies, the Act of 1936 broadened subsidies to include both the construction and the operation of merchant vessels. Under the terms of the act, the government (operating through the Maritime Commission established by the act), after approving the construction of a ship, will pay the difference between the cost of constructing the vessel in an American and in a foreign shipyard. In addition, the government may make loans to shipping companies covering most of the remaining cost of building the vessel. On the operation side, the government will subsidize private companies to the extent of the difference in cost between operating, under similar conditions, American and foreign ships. In return for this substantial aid to private shipping concerns, the act provides that the vessels involved

will be automatically available for national defense. The loan and mail-contract provisions of the Acts of 1920 and 1928 were wiped off the books.

## Why Government Aid Is Required

The basic reason why an American merchant marine large enough to serve as an instrument of national defense requires government assistance is that the United States is at a comparative disadvantage with respect to the building and operating of ships. This much is apparent from the record of recent history. The exact extent of the comparative disadvantage, however, is not clear because we do not know exactly how much other countries subsidize their shipping. Admiral Land, head of the Maritime Commission, once put the problem in an interesting manner when he testified before a Congressional committee:

Mr. Worley. How much subsidy, direct or indirect, are our carriers receiving as compared to that received by other nations?

Admiral Land. That question is not capable of being answered.

Mr. Worley. There are too many ways by which the other nations subsidize their carriers, so it is impossible to determine it?

Admiral Land. Yes, sir; and there are things not published in regard to these other nations. I spent two or three years of my life to find out how much the Normandic cost, how much the Frenchmen paid for it, and I haven't found out yet.

But the American disadvantage in ship construction is undoubtedly a marked one. For example, the contract cost of constructing the *America*, the last big liner built in the United States before World War II, was 15.7 million dollars. whereas the Maritime Commission's estimates showed that a comparable liner built in Holland would cost only 10.5 million dollars. Expensive but highly productive American labor does

not produce a low-cost product when mass-production methods are not possible. Construction on a custom basis characterizes our peacetime shipbuilding industry, with the result that the industry operates at a comparative disadvantage. In the 1930's, moreover, wage rates in the American merchant marine averaged over a third above the level of the next highest country among the major maritime nations. This is clearly seen in Table 29.

TABLE 29

COMPARATIVE BASIC MONTHLY WAGES OF SEAMEN OF
PRINCIPAL MARITIME NATIONS, JANUARY 1, 1938

(dollars per month)

	UNITED STATES	BRIT- ISH	FRENCH	GER- MAN	ITALIAN	Japa- Nese	NOR- WEGIAN
First mate	200	119	140	132	86	39	113
Able seaman	72	48	35	50	27	14	42
Chief engineer	305	173	222	212	86	60	139
Oiler	84	54	37	64	33	17	n.a.
Radio operator, grade 1	128	93	99	116	68	40	72
Chief steward	133	76	53	76	28	22	79
Mess steward	62	49	33	26	25	n.a	n.a.

<sup>a</sup> Source: Merchant Marine Statistics, 1938, p. 120 United States Department of Commerce, Bureau of Marine Inspection and Navigation.

n a.: not available. The German figures overstate earnings, since the official exchange rate at which conversions were made was highly overvalued.

As striking as are the wage differences in Table 29, the real differences are even more marked. The reason for this is that the figures in Table 29 relate to the wages of seamen who are citizens of the country mentioned. But some of the European countries with the highest maritime wages hire crews made up mainly of low-paid Oriental labor. Thus, before the war many British cargo vessels were manned, apart from officers, by Indian or Chinese crews, and the discrepancies between British wages and the wages paid Orientals doing the same work were even more marked than the differences between American and British wages, as is shown in the table. Few American ships, on the other hand, employed non-American crews.

What about the profits of American shipping companies?

The record is clear on this point. During the interwar period-most companies showed losses in about eight out of every ten years, although the situation improved somewhat after the introduction of large subsidies in 1936. American companies have been faced with chronic financial difficulties.

# American Shipping and the Balance of Payments

The reader will recall from Table 19, which shows the American balance of payments from 1934 to 1939, that the United States regularly has a debit balance of payments on shipping account. During this six-year period, American net payments to other nations for shipping and freight services averaged 77 million dollars annually. In years of good business, our net payments are considerably larger. Thus, in the prosperous year 1937, net payments totaled 129.4 million dollars, as is shown in Table 30. Foreigners rely on net-dollar shipping receipts as a partial offset to the favorable balance of trade of the United States; or stated more broadly, foreigners rely on dollars earned from shipping to keep the American favorable balance of payments on current account from being larger than it is. Other things equal, foreign countries would have to borrow more in the United States or send us more gold or impose greater restrictions on our export products, if their net-dollar earnings from shipping should be reduced. It follows, therefore, that it would be economically unwise, as long as our merchant marine is dependent on public subsidies, to have a national policy which would change the character of our net foreign payments on shipping account.

There is only one reason why, if necessary, we should tolerate such a development. This reason is that an enlarged merchant marine is required for national defense purposes.<sup>2</sup> It is

<sup>&</sup>lt;sup>3</sup> It may be of interest to point out that consistency requires that some tariff protection be removed in order to preserve vital domestic materials for use in periods of national emergency. For example, it would appear that the tariff on high-grade zinc should be removed in order to discourage further depletion of an almost exhausted natural resource. In a future national emergency, the nation might be grateful to those responsible for using foreign instead of domestic deposits of zinc during years of peace.

TABLE 30

# Composition of American Freight and Shipping Account, 1937 (in million dollars)

Receipts	
Freight received on ocean traffic     a. On United States exports carried in American vessels     65.2	
b. On cargo carried between foreign ports in American vessels	68.9
<del></del>	00.5
Ocean passenger fares paid by foreigners traveling on American ships, including passenger expenditures on board	9.3
3. Expenses of foreign vessels in American ports	142.2
a. Freight on intra-Canadian traffic carried by American railroads	
b. Freight on American exports carried within Canada by	
American railroads 3.7 c. Freight on Canadian exports and imports carried through	
the United States 7.9	
d. Freight on Mexican exports and imports carried through the United States	15.7
Total receipts	236.1
Payments	
5. Ocean freight paid on American imports carried in foreign	186.4
vessels	180.4
including passenger expenditures on board	
7. Expenses of American vessels in foreign ports	40.0
a. Freight on American transit traffic routed via Canada on	
Canadian railroads	
Total payments	365 5
Excess of payments over receipts	129.4

<sup>\*</sup>Source: Problems of Forcign Trade and Shipping, pp. 1046-1047. House of Representatives, Hearings before the Subcommittee on Foreign Trade and Shipping, Special Committee on Post-War Economic Policy and Planning, 78th and 79th Congresses. Washington: 1945.

universally agreed that we must never again find ourselves in the helpless position we were in in 1914. And we should be in a much better position than characterized our shipping preparedness in 1939, when, despite a total tonnage second only to one other country, we had to embark on a greatly expanded shipbuilding program to meet the needs of national defense. The feverish pace at which we set about to build ships after Pearl Harbor involved wastes, reckoned in terms of inflationary and manpower pressures and the loss of steel and ship parts to other sectors of the economy because of over-all shortages, equal to prewar merchant marine subsidies extending over many decades.

But how large a fleet should the United States possess? The answer depends on a number of factors, such as the level of world trade, the relationship between the several categories in the American balance of payments on current account, and the size of the reserve pool of ships which the United States will keep idle until needed in a national emergency. There is one answer, however, which comes from the head of the United States Maritime Commission and which has received support in shipping circles. This answer is that the carrying of our foreign trade should be on a 50-50 basis, the United States sharing the load equally with the ships of the rest of the world. order to appreciate the significance of this recommendation, it is necessary to see how the suggested ratio compares with the past record. The picture is presented in Table 31, which indicates the proportion of our foreign trade carried by United States and foreign vessels.

It will thus be seen that the proportion of our foreign trade carried in our own vessels declined steadily during the interwar period. The average was only a little over 30 per cent in the 1930's, a decade of relatively low volume of international trade. An increase to 50 per cent would restore the proportion which was carried in American ships just after World War I.

The recommended rate of 50 per cent, however, must be judged not by the past record but by other considerations. First, the needs of national defense are paramount. But what does national defense require? In a modern world, a nation such as the United States does not go to war alone, and our shipping policy should reflect this circumstance. In other

TABLE 31

THE PERCENTAGE OF AMERICAN FOREIGN TRADE CARRIED BY

AMERICAN AND FOREIGN VESSELS, 1921-1939=

	CARRIED IN UNITED STATES SHIPS	CARRIED IN FOREIGN SHIPS
1921.	49	51
1922	48	52
1923	40	60
1924	41	59
1925	. 37	63
1926	32	68
1927	. 38	62
1928	. 38	62
1929	. 38	62
1930,	. 33	62
1931	. 36	64
1932	35	65
1933	33	67
1934	. 33	67
1935	32	68
1936	30	70
1937	27	73
1938	. 26	74
1939	22	78

Source: United States Maritime Commission, as reported in Hearings before the Subcommittee on Foreign Trade and Shipping, p 1179. House of Representatives, 78th Congress, 1944.

words, appropriate allowance should be made for some measure of pooled shipping with other maritime nations during a period of war. In the second place, comparative advantage is even more important in war than in peace. There is the greatest premium on economic efficiency during war because so much is at stake and because there is so much pressure to maximize the yield from resources. Considerations of comparative advantage are thus of no mean importance in the shaping of national shipping policy. A final consideration has to do with the requirements of an equilibrium balance of payments. The nearer the approach to such an equilibrium, the more do we as a nation contribute to the maintenance of the healthy economic relations which are so important to a world which wishes to remain at peace.

The problem is how to translate the above principles into action. On the eve of World War II, our merchant marine totaled somewhat over eight million gross tons, a considerable portion of which was obsolescent. Students of shipping indicate that a fleet of 10 million tons of new, fast ships available for regular service, plus a laid-up reserve of six to eight million tons additional would meet the minimum needs of national security. A fleet of such size would require considerable subsidization. Anything larger would make serious inroads into the dollar earnings of the rest of the world, and would thus aggravate the balance-of-payments position of many countries that have a heavy economic stake in shipping. If we succeed in maintaining high-level employment in the United States. our imports and exports will be about double the prewar volume. An active merchant fleet of about 10 million gross tons would therefore enable foreign shippers to carry more than half of our foreign trade. But if the volume of our foreign trade fails to reach about twice the prewar level, a merchant fleet of the same size would mean that well over 50 per cent of our foreign commerce would be carried in our own vessels. It is apparent, therefore, that there is nothing magical about the idea of a 50-50 basis.

#### Summary

We have seen that the national stake in shipping varies considerably from country to country. Little Norway has the greatest relative dependence on shipping income, and several other small countries are also heavily dependent upon shipping. Among the larger nations, we emphasized the contrast between Britain, to whom shipping income is very important, and the United States, which regularly pays out on balance for shipping services. Cost differences in shipping were discussed briefly to indicate the economic basis for international specialization in this field. We then turned to consider the case of the United States.

After having enjoyed a period of comparative advantage in

shipping up to the Civil War, the American merchant marine engaged in foreign trade had declined almost to the vanishing point by 1914. Because of a wartime building program and subsidies, there was a revival of the industry thereafter. But on the eve of World War II, our merchant fleet was still grossly inadequate to the needs of national defense. During World War II, a record building program enabled the United States to attain a position in which its tonnage was about equal to the combined tonnage of the rest of the world.

It appears that the United States can maintain a merchant fleet adequate to the needs of national defense only by a system of building and operating subsidies, such as are called for by the Merchant Marine Act of 1936. In the interest of economic balance, however, subsidies should not be used to support a merchant fleet greater than the minimum size needed for defense. It is imperative that the requirements of an appropriate commercial policy and considerations relating to the balances of payments of other nations must not be overlooked by policy makers.

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### Chapter

# Freer Trade Through Commercial Treaties

ALTHOUGH unilateral action to reduce trade barriers has occurred in some cases, the general approach to freer trade is by way of international commercial treaties and agreements. The present chapter stresses the major liberalizing content of commercial treaties, indicates the limitations as well as the advantages to be derived from such arrangements, and concludes with a discussion of the possibilities of broad international action to liberalize trade.

#### Historical Sketch

In the pre-Christian era and up to modern times, problems in the field of commerce related, in the main, not to the rules by which international trading took place but to the right to trade at all. During this early period, trading was regarded as the activity of adventurers. Everywhere, European traders were looked upon with suspicion, so that they generally had to work in an essentially hostile environment. Yet, so lucrative was this type of enterprise that the ability to carry on trade was regarded as a high privilege, and all manner of devices were employed by citizens of trading states to obtain such privilege. Thus, nation-states and trading municipalities sometimes waged war to obtain various gains. One such gain consisted of the right of their citizens to trade in the defeated country. The conditions of trading improved with the passage of time, and during the Middle Ages, permission to trade increasingly took the form of well-defined personal grants. Numerous and varied personal privileges and rights were bestowed upon traders of different lands. The varied character of these rights emphasized the need for equal treatment; finally, during the late Middle Ages, the problems of trading with the Middle East led to the development of the idea that commercial treaties should contain a pledge to the effect that the western state or municipality would receive as favorable a treatment as that accorded to neighboring states of the Middle East. This idea was the origin of the well-known mostfavored-nation (MFN) clause so often found in commercial treaties.

## Commercial Reciprocity

During modern times, two distinct types of MFN treatment have developed. The first is known as the <u>conditional</u> form, or <u>commercial reciprocity</u>. Since this is the type of MFN treatment to which the United States was wedded from its founding until shortly after World War I, we may discuss the conditional form in terms of American history.

At the time of the founding of our nation, the world was in the last phase of the era of mercantilism. Our founding fathers were therefore only too conscious of the harsh discriminatory policies of European states. Because of the European policies that existed at the end of the eighteenth century, the American government was more interested in obtaining rights to engage in commerce and navigation than in lower tariff duties abroad, which in any case were low and of minor importance. The exclusion of our commerce and shipping, or the discriminatory treatment thereof, was combated by making the granting of improved treatment in the United States conditional upon the other country's elimination of practices inimical to our trade. The conditional MFN treatment thus consisted of the swapping of trade or tariff favors as between a pair of countries, with such favors or concessions being extended to third countries only for an equivalent concession. (It is misleading to use the term concession with respect to such action because the concession makes it easier for us to buy goods which we can produce only at a comparative disadvantage. But the terminology is well-established, especially in the United States.) The basic shortcoming of the conditional MFN principle was the great difficulty involved in extending tariff concessions to third countries because it was well-nigh impossible to determine just what an equivalent concession was. In any case, third countries did not receive like concessions automatically, but had to bargain for them in each instance. In some reciprocity treaties, the United States even took the extreme position that third countries, desiring to obtain the same treatment accorded to the country with which the United States had just signed a treaty, could not offer an equivalent concession because the value to the United States of the original concession consisted in the concession being exclusive.

The second distinct type of MFN treatment contrasts sharply with the conditional form. (Under the latter form. a concession granted to a particular (favored) country for a compensation does not entitle another (third) country with which a conditional MFN treaty exists to claim the advantages of the concession unless it offers in turn an equivalent concession.) Suppose the United States and France are parties to a conditional MFN treaty, and that the United States by bilateral agreement grants a special tariff favor to Cuba. France is not automatically entitled to the same tariff rate as Cuba, but has to offer the United States an equivalent concession in order to be placed on a par with Cuba. In other words, the country with which there is a conditional MFN treaty has only qualified protection against an act making one country a favored country. Unless the treaty country is able to meet the concession with one of its own that is accepted as equivalent, it is in effect being subjected to discrimination. Unconditional MFN treatment, on the other hand, is designed to avoid the establishment of a most favored nation (one favored more than others). The unconditional form of MFN, which had been adopted by most nations prior to 1914, is designed

to maintain equality of treatment by assuring all states not discriminating against the commerce of the country in question that they will at all times be treated as favorably as the nation that is most favored. Under the unconditional form of the MFN clause, therefore, a concession to a third nation makes it favored only momentarily. In other words, it is really not favored in any effective sense, and the clause could more accurately be called the equal treatment clause. In the United States the unconditional form of the MFN clause has been adhered to since 1922. This clause in commercial treaties and agreements constitutes the pillar of protection against the discriminatory treatment of our trade.

### Recent History of MFN Clause

The history of commercial policy between World Wars I and II illustrates a number of difficulties associated with efforts to establish the clause as a general feature of international economic relations. One of the few real successes in the early post-World-War-I period in the sphere of commercial policy was the re-establishment of the unconditional MFN clause. The United States, traditionally an adherent to the conditional form, adopted the unconditional MFN principle in 1922. The countries of Europe, save France and Spain, also adopted the liberal form of MFN treatment at about the same time. a while, it appeared as if a long period of sane international economic relations was in store. Although many nations adopted the unconditional form of MFN, countries adhered more to the letter than to the spirit of the principle. The result was that the clause did not go far in meeting the problem of discrimination. The basic reason for the relative lack of success was the skillful use which countries made of the device of reclassification of tariff items. Dutiable categories were so minutely divided and subdivided in bilateral negotiations that tariff reductions applied in the main only to the immediate parties to bilateral negotiations. Third parties received few benefits as a result, though tariff reductions were extended. on paper, to other nations according to the unconditional MFN rule. The classic example of tariff reclassification is found in a German-Swiss treaty: "Large dappled mountain cattle, or brown cattle, reared at a spot at least 300 meters above sea level, and which have at least one month's grazing each year at a spot at least 800 meters above sea level." By means of this language, the duty reduction was made to apply only to the product of a restricted area of a single country.

Why was tariff reclassification carried to such lengths and why did some countries even refuse to adopt the unconditional MFN principle? (For one thing, tariff bargaining occurred on an unprecedented scale after World War I. Tariffs were deliberately inflated mainly to allow a greater margin for bargaining purposes)(although a part of the margin was designed to curtail imports in order to strengthen balances of payments, and to obtain protection against what was known as exchange dumping—that is, imports alleged to have been made possible because of the excessive depreciation of other currencies during the period of transition to normal). Countries practicing tariff bargaining attempted to limit the scope of duty reductions by redefining tariff classes in such a way as to reduce to a minimum the extension of benefits under MFN.

(In the second place, during the period of international tension and ill feeling, which lasted until about 1925, some countries tried hard to withhold MFN treatment in an effort to prevent indirect assistance to the defeated powers.) France was the principal country in this category. (Thirdly, many countries, although formally adhering to the unconditional MFN principle, were reluctant to extend to third parties concessions made in bilateral arrangements because some potential beneficiaries, such as the United States, had erected insuperable tariff and other barriers against the leading exports of the country granting tariff reductions.) In the case of France, prohibition in the United States was a particularly severe blow to wine exports. (Finally, the effectiveness of the formal ad-

herence to MFN was reduced because some countries refused to subject their tariff structures to negotiation, with the result that others were unwilling to reduce duties among themselves on an unconditional MFN basis for fear of extending noncom-

pensated concessions to countries, such as the United States.

which were not on a tariff-negotiating basis.)

At bottom, however, the honoring of MFN about as much in the breach as in the observance was intimately tied up with the dominant view towards imports. (After World War I, there was a rapid growth of a deep suspicion that imports were an element of disturbance and depression.) In the popular mind. this view was based largely on the American experience of the preceding three quarters of a century, during which the United States had grown to be the greatest and most prosperous industrial country in the world under a system of high protective tariffs. The same underlying suspicion still exists, but it is couched in different terms. ( Today, imports are suspected because of their effect on employment, and arguments are used running in terms of such elements as multipliers, expansion coefficients, and other fancy expressions for basically simple phenomena.) We may illustrate a current view by reference to a controversy that developed late in 1944 over the timing of the removal of the export controls of the United States in anticipation of an early conclusion of the European phase of the war. A Harvard professor pleaded for the retention of export controls as a domestic anti-inflationary device, but admitted that (1) an increase of exports results in increasing employment over the short period and (2) a high level of both exports and imports is desirable. He went on to make the following assertion in an effort to weaken the case for restoring freedom of export: "I am arguing that in the long run any increase of exports entails a corresponding rise of imports and therefore a corresponding decline of employment. This offsets the rise of employment associated with higher exports. This holds in a general way unless the United States is prepared to give away billions of dollars of goods through an excess of exports over imports as they (sic) have done in the last generation."

What does this argument really amount to? In the first place, it makes mere jobs, mere man-hours of employment, the central criterion. The quest for full employment obviously means much more than this. Secondly, and basically, it involves a misuse of the concept of long run. In a state of full or substantially full employment, an increase of exports offset by a corresponding increase of imports is welcomed, since it increases the real value of domestic production. The imported goods would require greater effort to produce at home than to acquire indirectly by foreign trade. This is the standard and unassailable argument, handed down by writers of the past, for the gains to be derived from trade.

However, the traditional argument is strictly valid only on the assumption of full employment of resources. When labor and other resources are underemployed, the traditional argument does not hold. Because of the savings and investment habits of a well-developed capitalistic society—the habits being traceable to the distribution of income—it is possible for a condition of underemployment to exist for a long time in the absence of compensatory government policies. But in the long run there is no reason why government cannot undertake purely domestic measures to maintain high-level employment and at the same time enable the nation to take advantage of the international division of labor. It is only in the case of short-run underemployment that it is possible to say that an increase of exports, offset by an immediate and corresponding increase of imports, may provide no net stimulus to employment. Even in this case, however, a distinction must be made between the cases of autonomous and induced changes in imports.1 In the latter case, a higher level of employment is achieved and maintained if an original increase in exports induces, through its income effects, a corresponding increase in

<sup>1</sup> Machhup, F , National Income and the Foreign Trade Multiplier, Chapter 1.

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imports. Exports, imports, and employment are all higher in consequence.

An autonomous increase in imports, on the other hand, reduces employment initially in the receiving country, but this employment is regained with the attendant expansion of exports to match the autonomous increase of imports. The net effect, in this case, is to leave the level of employment unchanged.) A word of caution should be added: The manner in which an increase of exports is achieved is all-important. If the method involves the beggar-thy-neighbor technique in any one of its numerous forms, the country is open to retaliation, with the result that there will be a net loss all around. In any event, the problem is one with respect to the short run; in the long run a variety of domestic compensatory devices are available to modern government to enable it to achieve full employment without sacrificing the efficiency of a full-functioning international division of labor.

(The fear of imports and the correlative desire for self-sufficiency is often carried to extremes by protectionists.) A good example of this state of mind is afforded by some testimony before a committee of the House of Representatives in 1944. The witness, a former teacher of economics and one-time Director of the Bureau of Foreign and Domestic Commerce of the Department of Commerce, was speaking as the head of the Cotton Textile Institute, a powerful trade association. This is what Claude T. Murchison, the witness, had to say:

"Foreign trade is not an end in itself; foreign trade is a means to an end. And what is the end? It is the welfare of the internal economy of a particular nation. Ever since there were nations, the objective of every country has been to make its own people as nearly self-sustaining as possible; and I think no government today, regardless of any universal theory, could stand, could endure, and violate that basic conception, which is that its policy must be to make its own people self-sustaining as nearly as possible. I know no greater assurance of world peace than that fact. It is a sense of dependence that creates international fear

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and suspicion; it is not something that comes with a sense of self-sufficiency. In the effort to make a country self-sustaining it must be recognized that in the interval of time there will be scarcities and there will be surpluses; and the purpose of foreign trade is to compensate for those scarcities as they are and to take care of those surpluses, if possible, as they are. As means are found, through the operations of the internal economic system, for a country to meet within itself those surpluses and scarcities, then the need for foreign trade becomes progressively less and less.

"Let us take some specific illustrations which are very vital at the moment. We have spent during the past couple of years something like one billion dollars to build a synthetic rubber industry. Why did we have to do that? Because we were dependent on other nations. We have built a synthetic tire which the director of the emergency agency of the Government in rubber said the other day he would just as soon have for his automobile as any tire made of natural rubber. Now, is it to be assumed offhand that we shall destroy a billion-dollar industry which has made us self-sufficient, so far as rubber is concerned, for the sake of foreign trade after the war is over, in order to give continued employment to 50,000 or 100,000 workers on British plantations on the Malay Peninsula?

"During the war period there has been a great shortage of oils and fats, a large part of which we had to import in prewar years. American agriculture has done a perfectly phenomenal job in expanding the production of soybeans, peanuts, and other sources of vegetable oils and fats. Is it thinkable that for the sake of foreign trade we must give up all of that in order to give employment to unknowns in distant and foreign countries? I think it is not reasonable to assume that any government would follow such a procedure. As the efforts of agriculture, of industry, and of science progress to make for us here at home the things that we need—because everybody says, 'Let us make it here'—are they going to be defeated by the abstract conception that world trade is a need in itself?

"Fifty years from now we may look back on world trade as a temporary chapter in history, glamorous and important in a certain stage of the development of mankind, but something that has passed its time. I do not mean to indicate by that that world trade is going to dry up; what I mean to say is that world trade should be incidental to the requirements of a domestic economy, and the major purpose of a domestic economy is to keep the population of one's own country on a self-sustaining basis. It seems to me that the facts and the reasoning there are so obvious as to render almost unnecessary any argument on the question as to whether the American cotton-textile industry, or any other industry in America, should be jeopardized through foreign competition and the throwing down of tariff walls on the filmsy theory that thereby we are going to raise the standard of living of the world." <sup>2</sup>

It will be observed that the witness is subtle enough not to say that there should be no foreign trade. But what does he mean by the statement that a nation should be as nearly "self-sustaining as possible?" The record is clear on the point. He was asked whether he "advocated a program of self-sufficiency on the part of this Nation." His reply, interestingly enough, was as follows: "Yes, I certainly do, insofar as it is economically practicable." In other words, he wanted to have it both ways at once. In the literature on protectionism, contradictions of this sort are legion.

### Preference Arrangements

(When the circumstances of international affairs do not permit universally applicable across-the-board reforms in commercial policy, it is desirable to explore the possibilities of more limited accomplishments. One approach is that of preferential trade agreements or arrangements—that is, arrangements in which more favorable tariff or other import treatment is accorded to preferred countries only. Throughout history, preferential agreements have tended to be restrictive of trade rather than the reverse.) But this circumstance reflects the strength of protectionist forces, not the constructive

<sup>&</sup>lt;sup>2</sup> Cotton, pp. 198-199. Hearings before the Subcommittee of the Committee on Agriculture, House of Representatives, 78th Congress. Washington, 1945.

<sup>3</sup> Italies added.

possibilities which are inherent in some preferential arrange-

ments.

(A system of preferences may lead to the constructive accomplishment of freer international trade only if the tariff level or other obstructions to trade are reduced within the circle of nations included in the system.) In other words, a constructive preferential arrangement is one in which nations outside the arrangement are not burdened with absolutely greater tariff or other trade obstructions, and the obstructions to trade as between the parties to the preferential scheme are reduced in number or lessened in severity. Countries outside the arrangement thus find themselves faced with relatively greater impediments to trade, even though there is a decline in the average level of trade restrictions. The net gain in the direction of freer trade is then measured by the decline in restrictions as between the parties to the preferential arrangement. Regarded as a limited objective, the resulting situation represents an improvement in international economic relations.

It was stated above that preferential schemes have actually operated to increase rather than decrease the severity of restrictions upon trade. But there have been outstanding attempts to bring about constructive preferential arrangements. Perhaps the best illustration in recent decades is the attempt which was made at the Ottawa Conference of 1932. This was the Conference that finally produced the much-criticized system of British Imperial Preference. The British delegation, however, as the central party at the Conference, actually was instructed by its government to seek to reach a constructive preferential system as between members of the Empire. But the forces of increased protectionism were too strong. Instead of reduced tariff duties on intra-Empire trade, preference was achieved by increasing tariffs and other restrictions against non-Empire countries.

The net gain in the direction of freer trade under a constructive preferential arrangement may, however, be purchased at a certain economic cost. In the case of Cuban-American trade preference, for example, the reduced duties (or favorable quotas) which each extends to the other on certain items of trade involve mutual subsidization of exports. Cuba's exports of sugar to the United States are really subsidized by Americans to the extent of the difference between the general tariff on sugar and the rate of duty made applicable to the Cuban product. In return, American rice exports to Cuba are subsidized by the latter on the same general basis. In both cases exporters obtain prices in excess of those prevailing on the world market, or are enabled to sell at a higher average price than would otherwise be possible.

(The subsidization is not parallel in basic respects, however. Cuba's subsidization of American rice, for instance, serves to displace imports of rice from southeast Asia, the world's cheapest source of supply. On the other hand, American consumers of sugar benefit from the subsidization of Cuban imports because Cuban sugar thus displaces higher-cost sugar that would otherwise have to be imported or produced domestically. Considering direct and indirect costs to consumers in the two countries, it may be said that Cuban-American preference raises the price of rice to Cuban consumers and lowers the price of sugar to American users. Since the average real income of Cubans is much lower than that of Americans, we can say, borrowing a phrase from public finance, that Cuban-American trade preference is regressive in its incidence upon Cubans.)

The Cuban-American case also illustrates how preferential arrangements affect resource use. Cuba's economy is largely complementary to that of the United States because of the latter's soil resources, climate, and the character of its agriculture. Nations brought into closer economic proximity should supplement each other in the matter of resources and aptitudes. If the economies are basically supplementary, the preferential arrangement at least serves to expand trade between the economies involved, in accordance with the principles of advantageous specialization in production. This does not mean, however, that preferences based on complementarity in

production are unobjectionable; they still involve, as we shall have occasion to point out more fully at a later point, discrimination against third countries not included in the arrangement even though such third countries can claim the same or a higher degree of complementarity.

#### The Customs Union

(Carried to its logical conclusion, the system of trade preference leads to the union of two or more sovereign states into one customs area, or zone of free trade. Such a union of states for trading purposes is known as a customs union.)

Customs unions have been fairly important historically, in contrast to their status today. A very important case was the formation of a Zollverein, or customs union, of the German states in 1834. This action removed all restrictions upon trade between the German states, and so unified a large economic area in Europe. For a time, world trade was greatly stimulated, since the new German customs union did not raise tariff rates against the outside world, and the predominant German agricultural class favored a policy of cheap industrial imports. Before many years had passed, however, the spirit of nationalism began to manifest itself in a desire to develop a strong industrialism in Germany. This spirit, together with the growth of competitive agricultural export capacity in new areas overseas, served to produce a growing desire for protection of all sorts. There is general agreement that, viewed in the large, the Zollverein was more than anything else a tool of political unification.

Today the only well-known customs union is that joining Belgium and the Grand Duchy of Luxembourg. But even this case is not of great consequence for international trade as a whole, since Luxembourg is little more than a county bordering on Belgium. Belgium and Holland, however, sought to establish a customs union, but their efforts came to nought when some of the larger states of Europe raised objections on MFN grounds. (This instance obviously indicates, from a

broad international view, an improper use of the MFN clause.)

The case of the unsuccessful attempt at unification of Argentina and Chile for customs purposes, a scheme which was energetically pursued during World War II, illustrates a difficulty commonly encountered when a customs union is seriously proposed. Both countries have industries which are predominantly agricultural and extractive, so that manufacturing is relatively undeveloped and on the whole inefficient. Under a common customs area, the most efficient plants in either country would be the only ones to survive economically, transportation costs being considered. But both countries sought to prevent the contraction of domestic industries, however inefficient they might be. The Argentine and Chilean proponents of a customs union wanted to freeze the existing pattern and scope of the inefficient industries in both countries. Such an arrangement was clearly in contradiction to the spirit and purpose of a customs union.

# The Bilateral Approach to Freer Trade

(Restrictions to trade may be whittled down (1) by having pairs of countries reduce tariffs and other barriers to each other's trade, (2) by having three or more countries take steps to accomplish the same purpose, or (3) by a single nation acting entirely on its own initiative and independently of action taken by other countries. These methods are known respectively as the bilateral, multilateral, and unilateral approaches to freer trade.) Since the unilateral case is extremely simple in principle and extremely rare in practice, we shall here confine our remarks to the bilateral and multilateral methods.

In the case of the bilateral approach to freer international trade, the procedure consists of swapping commitments to lower the barriers which each country places on imports from the other. Now, if the result is simply the reciprocal reduction of import barriers, so that the benefits are confined to the two contracting states, the outcome is really no different from

that described previously in the case of commercial reciprocity. Freer trade would result, to be sure, but only at the expense of a measure of international discrimination. Third states, although faced with trade barriers which are not absolutely higher than before in the two contracting states, now find that they are at a relative disadvantage. They are faced with barriers which are higher than those with which the two contracting states have to contend.

When barriers are reduced bilaterally, the way to avoid discrimination is to invoke the MFN clause in its unconditional form.) This means that if countries A and B lower tariff rates on certain commodities of interest to each other, the lower rates immediately apply to the imports of such commodities from all other countries, provided only that the other countries are not found to be discriminating against the trade of A and B. In this manner the reduction of trade barriers is bilateralistic only in regard to the way in which the problem is approached. In substance, there is an across-the-board or multilateral application of results achieved in bilateral discussion and agreement, thanks to the role of the unconditional MFN clause. (Incidentally, the reader may be reminded that the bilateralism complained of in earlier chapters, especially in the discussion of exchange control, was bilateralism in its pure form -that is, bilateralism unabridged by MFN safeguards.)

The degree of multilateral application depends, however, on the particular circumstances surrounding the bilateral agreement under discussion. Experience has demonstrated that in normal periods a nation (A) generally will not agree to effect a reduction in its tariff rates unless the other party to a bilateral bargain (B) agrees to reduce its tariff rates to such a degree as to lead to an appreciable expansion of imports from A. But such a result is likely to occur only if A has been the major supplier of B's imports of the commodities involved. If A is not B's major supplier, any reduction in B's tariff will redound primarily to the benefit of third countries, and only secondarily to A. In such event, A is prone to emphasize that

it would be receiving too small a quid for its quo. It follows from these circumstances, therefore, that the degree of multilateral application of bilaterally produced duty reductions will be the greater (1) the smaller the first party's share in the second party's imports and/or (2) the greater the capacity of third countries to expand their production of the goods in question on an efficient basis. The contrary would be the case if the goods involved are not capable of being produced at all or only in limited volume in third countries. This is clearly seen if we assume that B is the only producer of the commodity the tariff on which has been reduced by A. It would be realized only too well by B that in such a case the formal generalization of reduced duties under the unconditional MFN rule would be devoid of direct significance to third countries.

Although not without its limitations, the bilateral approach to freer trade has been partially successful. But we shall discuss how successful it has been when we consider in Chapter 26 the manner in which it has been employed by the United States in recent years.

#### Multilateral Tariff Reform

(Three or more nations may arrange to whittle down barriers to international trade by means of multilateral agreements.) In this section, we shall indicate several alternative multilateral methods of producing freer trade by way of an attack on the tariff problem. Tariffs, to be sure, are no longer the only or, in some cases, even the most important trade barrier, so that the reader must bear in mind that successful multilateral tariff reform, desirable as it may be, is not synonymous with a successful attack on the broad trade-barriers problem. For example, such restrictive devices as exchange control and import quotas would still exist or would still present a problem. The nontariff restrictions, however, do not lend themselves to reasonably precise comparative treatment because they are so internationally diverse in character, complicated in structure, and unpredictable in incidence. Some form of direct action,

tailored especially to fit individual cases, will be required to cope with the problem of nontariff controls over international trade. But more will be said about some possible correctives of nontariff controls at a later point. For the remainder of the present chapter, therefore, we shall confine our discussion to multilateral tariff reform, in itself a problem of no mean significance.

Before specific alternative methods of reforming tariff systems are considered, a word should be said about some of the general consequences of the systematic reduction of tariff duties. (In the first place, since even very high-cost domestic industries usually include firms efficient enough, at some workable scale of output, to be able to face foreign competition without the aid of protection, the reduction (or abolition) of particular tariff duties need not involve making the domestic market completely dependent on foreign sources of supply for the commodities involved. (It is well known that the United States has always been completely dependent on foreign sources for certain commodities, such as coffee.) Under a system of reduced tariff duties, therefore, protected industries will find their situation changed in two respects: (1) The highest-cost firms will probably disappear entirely. (2) The more efficient among the firms comprising the industry will operate at a lower output and with reduced profits. This second point, in turn, gives rise to two results. First, domestic monopolies sheltered by the tariff will be forced to face the healthy influence of foreign competition. Moreover, if tariff reform is coupled with an appropriate fiscal policy, the reduction of profits to competitive levels will reduce the community's marginal propensity to save, and thereby tend to stabilize the level of spending in the economy as a whole)

(In the second place, a large-scale reduction of tariffs will involve short-run deflationary effects.) The timing of such a reduction of tariffs is, therefore, of the utmost importance. Ideally, such reform should be timed to coincide with periods of widespread adjustment of production as, for example, is the

case immediately before the period of conversion of industry to peace production at the end of major wars. (As a matter of fact, agencies of the United States Government emphasized this point as early as 1942.) There are several reasons why such a period is an ideal one for the purpose under discussion. Unemployment is nonexistent. During war, tariffs have little effect on competition between imported and domestic products, and many industries formerly dependent on tariff protection are engaged in war production. Moreover, since industries converted to war production will have to undertake major adjustments in returning to peacetime production, the broader interest requires that they be reconverted to lines in which there will be less dependence on tariff protection. Finally, demands deferred because of wartime shortages should help at least for a few postwar years to facilitate the shift from uneconomic to economic lines of production.

(If the best results are to be obtained, the systematic reduction of tariffs requires that changes should be based on a multilateral approach.) Agreements between pairs of countries will still prove useful in dealing with special problems not important enough to be included in a broad agreement involving many countries: that is to say, such bilateral agreements should supplement multilateral agreements. Bilateral arrangements should always be in harmony with the provisions and spirit of multilateral pacts. It is no exaggeration to say that unless multilateral arrangements are made in any one of their several forms, there is danger that the world will resort to the types of bilateral trade and payments agreements developed by Germany and Great Britain in the 1930's with countries in Europe and Latin America. As we have seen in previous chapters, such agreements tend to restrict rather than to expand the volume of international trade, and to divert trade into uneconomic channels. In the political domain, moreover, such agreements have been used to reduce the weaker of the two countries to a state approaching vassalage.

(A multilateral trade convention, to which all states would

be invited, might appropriately serve as the vehicle through which a broad international reduction of tariffs could be effected.) The convention would also consider other matters, such as customs formalities, quotas, import and export prohibitions, and cartels. These other matters, which are discussed in other chapters, give rise to problems no less important than the tariff problem. But tariff reform should logically engage our attention first, since tariffs are basically simpler devices than many of the other restrictive measures just mentioned.

We turn, then, to a consideration of several methods of reducing tariff barriers multilaterally—that is, by a number of countries simultaneously, each nation extending reductions agreed upon with particular states to imports from all other nations not found to be discriminating against that country's exports.

Method One. This method calls for the reduction of all protective duties existing at a particular time to a given percentage ad valorem (or the same ad valorem equivalent in the case of specific duties), provided that in no case will duties be reduced below a specified percentage ad valorem. The effect of this method would be to lower the average level of existing duties while placing a floor on permissible reductions. Since the floor places a limit on duty reductions, the outstanding advantage of this method is that the reductions will bear more heavily on countries with high tariffs than on countries with low duties. On the other hand, this method involves several practical difficulties. First, it would materially alter the tariff structure of individual countries that have a large number of duties above the percentage ad valorem to which duties are to be reduced. The tariff structure—that is, the relationships between duties on different commodities—would be changed from one of high and low duties to one of uniformly lower tariff rates. Secondly, the method would require the establishment of a relatively uniform system of customs valuation among the various countries. This would be required for two reasons: (1) It would be needed to insure that the same percentage duty would mean about the same thing in all countries. Obviously, the same percentage duty would represent a different level of protection in different countries if some countries valued imports f.o.b. but others valued them c.i.f., to say nothing about frankly arbitrary valuations. (2) A relatively uniform system of customs valuation would also be required in order to obtain the ad valorem equivalents of specific duties. This would involve the overhauling of the tariff system of countries having a general system of specific duties or a system of arbitrary valuation.

The advantages of Method One are considerable, particularly as regards the need for reform in countries having a number of prohibitive import duties. In the United States since 1934, for example, duties have been reduced by agreement with other countries up to a maximum of 50 per cent of the rates specified in the Tariff Act of 1930, yet many of such reduced rates are still prohibitive of imports. The substitution of a comparatively low ad valorem floor instead of a maximum percentage reduction would at least eliminate prohibitory tariff rates.

Method Two. Another method would be to require the uniform reduction of all protective-tariff duties in all countries by a given percentage of their height on a certain date. The several advantages of this method are that (1) it will preserve to a large degree the tariff structure, or the relationships between the tariff rates on different commodities. (2) it will be simple to administer in all countries, and (3) it will have the appearance of treating all countries alike. On the other hand, the method would be regarded as inequitable by low-tariff countries. The seriousness of this criticism may be appreciated if it is noted that this method would reduce low tariffs to the same relative extent as high tariffs. Moreover, in view of the secular rise in prices, the method would be particularly objectionable to low-tariff countries having many specific duties whose degree of protective effect had declined owing to increased prices. This defect could be remedied only by providing that higher duties be subject to a greater percentage reduction than lower tariffs. But this remedy would involve the same technical difficulties that were found in connection with Method One.

Method Three. Multilateral tariff reduction could also be achieved by requiring the reduction of all duties by a given percentage, provided that no duty need be reduced below a stipulated ad valorem level or its equivalent. It is important to observe that this method differs significantly from Method One. The latter, for example, would reduce all protective duties to, let us say, 20 per cent ad valorem. Protected domestic producers could only count on aid that is equal to 20 per cent of the foreign value of the same or comparable product.4 Method Three, on the other hand, calls for the reduction of existing high and low duties by, let us say, 20 per cent. The ad valorem equivalent of the duties after being reduced by 20 per cent would vary from case to case, instead of being uniform. Because of the floor below which duty reductions cannot be made. Method Three would insure that tariff reductions would be equitable as between high-tariff and low-tariff countries. This is the main factor which distinguishes Method Three from Method Two. It also would preserve to a large extent the tariff structures of various countries. On the other hand, like Method One, it would involve the technical difficulties of tariff valuation.

Method Four. A further method might call for the uniform reduction by a given percentage of the over-all ad valorem equivalent of each country's entire tariff, the ad valorem equivalent being calculated as of a given date and with reference to the country's total imports. In effect, this over-all ad valorem equivalent would be an average inclusive of duty-free imports. (It would not, however, be a weighted average duty, since the weighting of prohibitive duties would produce the

<sup>&</sup>lt;sup>4</sup>This is true, at any rate, of the United States. Under our tariff laws, duties are levied on the value at the foreign port of origin, as certified by our consular officials. In a few instances, the President is authorized to substitute the American selling price or the American value for the f.o.b. value.

illusion of a lower level of ad valorem equivalent than actually exists, and the weighting of duties of zero (duty-free imports) would also produce the same spurious result.)

This method would probably be preferred by most countries, primarily because it would permit tariff reductions to be made on a highly selective basis. It would also be free from the technical problems of customs enforcement. In addition, the method would interfere to a relatively small degree with each country's tariff autonomy.

The principal advantage of Method Four, however, is also its main disadvantage, since the reductions may be concentrated chiefly on commodities subject to moderate duties while leaving the highly protective or prohibitive duties unchanged. In the second place, the method under discussion would attach too much weight to reductions of superfluous duties on products of which there is no actual or potential importation. Thirdly, the method suffers by virtue of the fact that it would require no greater proportionate tariff reduction by high-tariff than by low-tariff countries.

<u>Method Five</u>. A fifth method of reducing tariffs multilaterally would be the re-establishment of the tariff schedule that was in effect in each country on a previous specified date. This method would have two advantages. It would strike particularly at the excessive tariff increases during recent decades. In addition, it would have the appeal of precedent, inasmuch as many countries, including the United States, have adjusted their own tariff structures in the past by this method.

On the other hand, the method involves two serious difficulties. First, it probably would be difficult to obtain agreement among the various countries regarding the date to be selected, since any single date would represent different effective percentage tariff reductions by each country. This is because the tariff systems of different countries have evolved at different rates of speed. For example, if 1929 were selected as the date, the duty reductions to which the United States would be subject would be merely the difference between existing tariff

rates and the comparatively high tariff of 1922. Great Britain, however, would find that the reduction of duties to the 1929 level would involve the removal of a substantial part of its entire tariff, since the bulk of Britain's tariff dates from 1932. Secondly, the method would present serious technical difficulties. Outstanding among these would be the problem of tariff classification—that is, the definition of commodities for tariff purposes, such as "wheeled tractors between 75 and 89 horse-power," "wheeled tractors between 90 and 100 horsepower," and so on, instead of merely "tractors." Since such classification varies in kind and extent from country to country, tariff schedules in effect 20 years ago might not provide adequately for many products developed since that time.

Method Six. Another approach might be the repeal by each country of increases in its tariff in reverse order, so that the most recent increases are repealed first. This method possesses the same advantages as Method Five. In addition, it would leave undisturbed rates which had not been increased. As offsets to these advantages, however, this approach, like Method Five, would involve different percentage tariff reductions by each country. Moreover, this method probably would be more difficult to operate technically than Method Five. The greater technical difficulty would consist of the fact that to the problem of tariff classification between countries would be added the problem of tariff classification in each country at different periods of time. For example, if the United States agreed to remove increases in the tariff made under the Tariff Act of 1930 and since then, it would be necessary to classify articles under both the 1930 and 1922 acts to determine the tariff rate that should be applied. To illustrate this point, we may assume that the 1930 act specifies one rate of duty for "wheeled tractors between 75 and 89 horsepower" and a higher rate for "wheeled tractors between 90 and 100 horsepower," whereas the Tariff Act of 1922 contains four classes of wheeled tractors, none of which include tractors developing as much as 75 horsepower. What rates of duty should apply? Clearly, an element of arbitrariness would be involved in the decision. The problem becomes more difficult as Method Six relates to earlier tariff acts in this backward process.

#### Summary

After dwelling upon the evolution of the most-favorednation clause, we explored the meaning of this clause in both its conditional and unconditional form. The conditional form is employed when nations wish to swap tariff and other bargains exclusively on a direct quid pro quo basis, so that a specific nation by specific agreement becomes literally most favored in terms of commercial treatment. The unconditional form of the MFN clause, on the other hand, is truly an equaltreatment clause, and is thus a basic ingredient of a liberal international trade policy.

First to be considered among the agreement or treaty devices for attaining freer trade was what is known as a preference arrangement. We distinguished between the restrictive and the trade-liberalizing preference agreement. The restrictive form is the method which involves the exchange of tariff and other favors among particular countries, not by lowering tariffs and so on as between such countries, but by subjecting the trade of all other countries to greater restrictions. The trade-liberalizing method, on the other hand, achieves an exchange of preferences by reducing the restrictions on imports as between specified countries while leaving unchanged the absolute level of restrictions on the trade of other nations. As such, it is a step, although not a big step, in the direction of freer trade.

We next considered the customs union, which is the result of the merging of two or more sovereign states into a single customs area. The few customs unions on record have taken place mainly in continental Europe, where many small nations that are uneconomic in size and resources lend themselves to betterment by way of such devices as the customs union. In more than one instance, however, desirable customs unions have been thwarted by the insistence of larger nations upon MFN rights, contrary to the spirit of equality of treatment in international trade.

Barriers to trade are likely to be attacked most effectively by means of bilateral and multilateral agreements. In the case of the bilateral method, however, it is essential that the MFN clause in its unconditional form be an integral part of the agreement; otherwise the results will be about as limited in scope as those attained under preference arrangements. We also saw that because of the MFN aspects of the case, reductions in import duties under bilateral agreements are generally accorded only to the major supplying nation. In exchange for lower tariffs in the other country that is a party to the bilateral agreement, the major supplier agrees to reduce duties on some products which it customarily imports mainly from the other country. The approach is essentially one of bargaining over the mutual reduction of barriers to trade, but in the process. third countries benefit in varying degree, owing to the applicability of unconditional MFN principles. It is because of such benefits to countries other than those which are parties to a bilateral agreement that this method has multilateral features.

But nations should resort directly to multilateral tariff reform if they seek to attain the best results in the briefest span of time. We outlined six formulas that might be used to this end. These formulas present various techniques that might be employed by nations that are determined to free the world of tariff barriers to trade. But no single formula or set of formulas will work unless the leading nations express a real determination to see the job through.

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### Chapter 24

# The Trade Policy of the Union of Soviet Socialist Republics

THE Soviet Union, which occupies a large part of the vast Eurasian land mass, has had a foreign trade of about the same order of magnitude as that of little New Zealand. Whv. then, should there be devoted a separate chapter to the trade policy of the Soviets? The answer is State Trading. U.S.S.R. represents the leading, and for many years the only, example of a full state-trading system—that is, a system in which the government controls exclusively the exportation and importation of all goods. As the world's most thoroughgoing socialist state, it is natural to find that the Soviet Union conducts all of its commercial intercourse with the outside world through a foreign-trade monopoly. The significance that is attached to Soviet foreign trade is out of all proportion to the country's relative importance in world commerce, partly because of the peculiarity of Soviet foreign trade and partly because of the country's status as one of the great world powers.

# The Foreign Trade Monopoly: Its Structure

Control stems from the Commissariat for Foreign Trade, a department of the government comparable to one of our own executive departments. Below the Commissariat for Foreign Trade are numerous Soviet trading combines, as they are commonly called, which carry out the actual operations of exporting and importing. Each trading combine (named after the kind of commodity with which they deal, such as Tractor

Combine, Lumber Combine, and so on) in turn is represented abroad either by a trade delegation (as in France) or by a special corporation set up according to the laws of the specific country (as in the United States). The reader doubtless has heard of the Amtorg Trading Corporation, the only prewar Soviet purchasing and selling agency (except for such small things as books and music) in the United States. (The term Amtorg is the Russian abbreviation of Amerikanskaia torgovlia. which means American trade.) Amtorg, which was incornorated under the laws of the State of New York in 1924, is typical of Soviet trading agencies located abroad. It is staffed with marketing specialists and technicians, such as engineers. But Amtorg is able to carry out only those assignments that are specifically given to it by the trading combine in the Soviet Union. That is, as an agent it can do no more than act for its principal in Moscow.

The Commissariat for Foreign Trade controls external trade by the simple device of licensing exports and imports. Since the Soviet Union is a planned economy, the Foreign Trade Commissariat does not operate independently of the central plan. Rather the over-all import and export program is formulated in advance each year by the central State Planning Commission, which tries to balance Soviet imports with expected exports. Expected imports and exports are thus geared into the whole complex of Soviet planned production. Given the planned import and export program, the Commissariat for Foreign Trade, by licensing imports and exports, permits the trading combines to carry out their own foreign operations. Such, in brief, is the structure of the Soviet foreign-trade monopoly.

# Historical Sketch of Soviet Foreign Trade

The foreign-trade monopoly, established by decree on April 22, 1918, is one of the oldest of existing Soviet institutions. At the time of its birth, however, the monopoly was little more than a paper institution, since Russian foreign trade was then

virtually nonexistent. A number of factors were responsible for this lack of trade. Among them were the civil war and inflation, the Allied blockade of the Soviets until 1920, uncertainty as to the international status of the Soviet Union, and the question of repudiated public debt and the seizure of alien property.

The resumption of imports on a modest scale in 1920 enabled the foreign-trade monopoly to come to life. But its activity was very limited in scope, and a new change occurred when the period of war communism came to an end during the following year. The government retreated from the policy of complete socialization to permit the partial resumption of free enterprise. This new status was known as the New Economic Policy, or NEP. Private production was permitted in minor lines, but key industries and banks were maintained as completely socialized segments of the Soviet economy.

The strength of the foreign-trade monopoly was materially diluted during the period of NEP. Although the monopoly shell was preserved, in substance much of the trade was conducted through decentralized channels. Both consumers' and agricultural co-operatives resumed pre-Soviet foreign contacts, and began to carry on trading operations. Mixed companies, in which the Soviet Government contributed half of the capital and foreign private entities supplied the remainder, were also employed in foreign trade. It was by such means as these that a beginning was made in rebuilding the country's trade relations with the outside world. This early period represented the period of government regulation, rather than operation, of foreign trade.

But the formal system of trade monopoly was not abandoned during this period, although there was some pressure from within the government to do so. Some officials wished to replace the monopoly by a system of protective tariffs. The dominant view, however, was that tariffs would not provide the degree of protection deemed necessary to assure the growth of domestic industries. The official fear was that foreign subsidies and the dumping of products at prices below cost might be used to jeopardize nascent industries. It was decided, therefore, that only a system of centralized and planned licensing of imports and exports would meet the needs of trading within the framework of the Soviet economy. Besides, the foreign-trade monopoly would assure that there would be no undue extension of free enterprise in the trading field.

When NEP came to a close in 1928, the planned economy was ushered in in full strength, and the foreign-trade monopoly assumed new stature as an integral part of the Soviet economy. Decentralization was eliminated. The government now conducted all foreign trade through the specialized instrument of the trading combine. Centralization and specialization were thus merged into the trading system, which has remained substantially unchanged to this day.

A relatively recent Soviet trading development, one which has been pursued with vigor since the close of World War II, is that of the binational trading company. In developing commercial intercourse with her western neighbors, most of whom were oriented towards central and western Europe prior to the war, the Soviets have joined with local governments to form a special type of trading company. This company is jointly controlled by representatives of the two governments, and is granted virtually exclusive trading rights in its particular line of activity. Generally, the company has a board of directors composed half of Soviet nationals and half of nationals of the respective country. The president is usually a citizen of the local country, and the vice president is a Russian.

The binational trading company is especially prominent in Rumania, where there is a Russo-Rumanian Bank (formed by the Soviet State Bank and the Rumanian Credit Bank), a joint transport company, and a Russo-Rumanian oil concern known as Sov-Rom. The latter is the most important of these binational companies. It handles the export of oil to the Soviet Union and has exclusive drilling rights in Rumania on land not previously granted to other foreign concessionaires.

In addition, it is the beneficiary of one half of the crude petroleum royalties accruing to the Rumanian government from foreign concessions. In Hungary, the Russian-Hungarian Trading Company, created in Budapest in August 1945, is a binational concern whose purpose is to handle all trade between the two countries. The binational commercial company should prove useful in strengthening the external ties of a state trading system.

#### Some Partial State-Trading Practices

Foreign trading by governments ordinarily constitutes a small part of the foreign trade of most countries. There are important cases, however, where trading in individual commodities is legally restricted to government agencies, and there are other instances in which government trading is important enough to influence appreciably the export prices of the goods in question. All state trading of this limited character may be called partial state trading. A brief discussion of several features of partial state trading should provide useful background material for an evaluation of Soviet commercial policy.

One important feature of partial state trading is that governments generally do not buy in the cheapest market without regard to other considerations. There are two reasons why governments do not follow the ordinary commercial rule as regards prices. First, for the purpose of favoring domestic industry, governments commonly make themselves subject to the payment of ordinary tariff duties on goods purchased by or for them. Such duties merely represent a bookkeeping transfer within the government's own system of accounts. The result of this procedure is that the price of the foreign merchandise is made to appear higher than the domestic price. whereas the relation may be the other way around when the duty is disregarded. Second, governments often go beyond the inclusion of duties in the determination of the foreign price and, as in the United States, accord to domestic sources of supply additional price preferences. Other things equal, therefore, the enlargement of the sphere of government trading in international trade tends automatically to increase the barriers to foreign trade.

A second feature of partial state trading, as compared with the practices of private firms, concerns the use of monopsony (that is, buyer's-monopoly) power. For example, in many countries domestic fiscal monopolies of the manufacture and sale of commodities such as gasoline, tobacco, alcoholic liquors, and salt, enable the government in some cases to purchase raw materials in a substantial enough proportion of the output of other countries to exercise a monopsony effect on price. That is to say, the government may be able to buy on better price terms, solely by reason of the quantities involved and the buying strategy used, than if the same quantities were purchased under otherwise similar circumstances by a number of private buyers acting independently of one another. The British system of bulk purchases, whereby the government is the sole buyer of the exportable products of certain countries, is a good example of the monopsony case. Thus, since early in World War II, the British Government has been the sole buyer of New Zealand's exportable butter, cheese, meats, and certain other products. Similar arrangements have been made with other countries within the British Commonwealth of Nations. all cases, the purpose is to improve Britain's terms of tradethat is, to obtain needed materials on the most favorable price terms.

A third peculiarity of partial state trading, closely related to the preceding case, has to do with the power to exercise discrimination between sources of supply. Whether for political reasons or to make the most of a buyer's-monopoly position, state trading greatly facilitates discrimination. This is because discrimination can easily be carried on administratively. There need be no special legislation and no publicity; the state trading monopoly may operate with all the flexibility that is necessary in each instance. Under such conditions, it is very difficult for complaints to be lodged, since the agency using

discriminating practices is not on record as doing anything of the kind. Friendly international relations are likely to be impaired if the accused government's word is called in question. A not unimportant type of discrimination here discussed sometimes occurs when particular exporting countries grant other countries signing (non-MFN) bilateral trade agreements specially favorable treatment in connection with state-monopoly transactions. In a few instances, such differential treatment is embodied, not in the published agreement, but in secret provisions thereof. Among the publicly announced agreements of this type we may cite the case of French commercial agreements with Scandinavian countries during the 1920's, whereby the state liquor monopolies of the northern countries undertook to buy exclusively in France the types of beverages which France could supply.

## Soviet State Trading and Nondiscriminatory Treatment

Charges of Soviet dumping in 1930 and 1931, at the outset of the world depression, led to inquiries concerning, among other things, the guarantees that could be obtained through international agreement against discriminatory treatment by a state trade monopoly. Soviet representatives assured a League of Nations committee that their purchases and sales were made according to a general plan and were guided solely by the commercial principle of "buying (and selling) in the market which happened to be the most advantageous in each particular case."

Before considering the implications of this statement, it will be well to touch upon two aspects of the concept of discrimination. In the literature of international economics, this concept is used in two senses. First, there is the sense in which it relates to trade barriers: One or more countries are treated more favorably than all the rest with respect to tariffs, quotas, exchange control, and so on. Second, the concept has a customary usage with regard to monopolistic practices: The same commodity is sold at one price to some purchasers and at a

higher or lower price, or set of prices, to other purchasers. Now, if the discrimination concept is borne in mind and if a country's good faith is not taken wholly for granted, we may obtain a clearer conception of the character of the Soviet pledge of nondiscrimination.

As compared with a nondiscrimination pledge made by a government whose foreign trade was wholly in private hands. the same pledge made by a state trade monopoly involves problems of a very different nature. The reason for this is that a state monopoly could violate such a pledge without the countries discriminated against being in a position to demonstrate that such violation did occur or without their becoming even suspicious of its existence. Under the Soviet rule of "buying in the market which happened to be the most advantageous in each particular case," the best results are obtained by the most skillful practice of discriminating monopsony (that is, discrimination by a buyer's monopoly). We may describe discriminating monopsony by comparing it with competitive behavior. In the case of competition, the trader would buy only in whatever market happened to have the lowest prices, and his behavior, along with that of others, would tend to equalize prices in different markets. A discriminating monopsonist, however, will make price offers which vary with the elasticity of supply in different markets. If a market is characterized by a relatively high elasticity of supply—that is, if the supply is readily expandable—the monopsonist will buy at higher prices than in markets with inelastic supplies. In the case of an elastic supply, a low price offer will lead to a relatively large reduction in the quantity of the commodity offered for sale, whereas the same price offer in a market characterized by inelastic supply will enable the buyer to purchase only a slightly smaller quantity than a higher price offer. The discriminating monopsonist, therefore, will adjust his price offers to the "least his different sellers will accept," and instead of seeking to equalize prices in different markets, he will seek to equalize his net-additional expenditures for additional units of purchase after allowing for the effects of his purchases on prices in different markets. (The equalization of net-additional or marginal expenditures after allowing for the effects of purchases on price means that purchases in each of the foreign markets will be carried to the point at which the last unit bought in each market involves the same outlay to the monopsonist.) The result of this action will be that the monopsonist's average purchase price will be below the level that would obtain if the goods were sold in a competitive market.

A similar result will be obtained if the state trade monopoly operates as a discriminating monopolist. Lower prices will be charged in markets of elastic demand, since lower prices result in substantially increasing sales; and higher prices will be charged in markets of inelastic demand, where buyers are less sensitive to price changes. In the market of elastic demand, there will be a small divergence between price and marginal revenue, whereas in the market of inelastic demand, there will be a greater spread between price and marginal revenue. However, since the discriminating monopolist will maximize his profits by equating marginal cost to marginal revenue in both markets, it follows that price will be lower in the elastic-demand market than in the inelastic-demand market.

The significance of this brief discussion of discriminating monopoly and monopsony is that a country's adherence to commercial principles is perfectly consistent with a system of trading according to the principle of price discrimination.

Given this monopoly power, what measures may be taken to protect a country whose traders operate competitively, apart from cartels, in international trade? In the United States, the maximum that has been done is to incorporate the following type of statement in most of the reciprocal trade agreements since 1934. "In case of a government monopoly for import... the government agrees... that in making its foreign purchases of any product such monopoly or agency will be influenced solely by those considerations, such as price, quality.

marketability, and terms of sale, which would ordinarily be taken into account by a private commercial enterprise interested solely in purchasing such product on the most favorable terms." It will thus be seen that this provision of trade agreements entered into by the United States, "the purchase on the most favorable terms," is exactly the same in principle as the Soviet declaration of "buying in the market which happened to be the most advantageous in each particular case." Strictly construed, a pledge of this sort granted by a state-trading country would not deny to its state trade monopoly the right to exercise its monopoly power in a discriminating-monopoly manner, provided that the power was used only to maximize economic gain. Unless an arbitrary formula is to be applied to cases of state trade monopoly, there does not appear to be much that can be done to restrain the use of that power for economic advantage. The basic difficulty is that, not the use, but the mere existence of monopoly power-whether in domestic or international trade—generally suffices to yield some monopoly gain.

For example, suppose the state trade monopoly agreed, for the sake of international comity, to buy at uniform prices regardless of the elasticity of supply in different markets. By such action the state trade monopoly would prevent itself from practicing discriminating monopsony. Unlike the case of a private competitive purchaser, however, the state trade monopoly could not prevent the size of its purchases from influencing the price it had to pay. The private competitive purchaser would carry his purchases to the point at which his marginal demand corresponded to market price, or to the average expenditure curve. A nondiscriminating monopsonist, on the other hand, would carry its purchases to the point where its marginal demand for the product corresponds to the marginal expenditure curve. Other things equal, the monopsony case represents a smaller volume of purchases than the competitive one.

Another case which should be discussed concerns the power

of a foreign-trade monopoly to threaten to divert purchases from one country to another. The mere threat to do this will force the other country to weigh the cost of adjusting its economy against the loss resulting from the involuntary granting of a reduced schedule of prices. The monopoly country can easily improve its terms of trade by this process. But it should be recognized that a country does not have to have a monopoly of foreign trade in order to accomplish substantially the same result. Thus, in order to achieve the same purpose, some western European countries have employed the threat of reducing the import quotas assigned to particular exporting countries. And during World War II, the United States threatened (and rightly so) to re-impose coffee rationing in an endeavor to prevent the supplying countries from withholding supplies for speculative increases in price.

In view of the circumstances outlined above, it will be seen that nations conducting foreign trade along ordinary lines must endeavor to protect themselves from possibly damaging action by state-trading countries. Such protection may be sought by making a special agreement with the state-trading country regarding the specific amounts of trade that will be permitted and the terms on which such trade will be transacted. This method of special agreement, however, means that the statetrading country is forced to bargain with the non-state-trading country. Such bargaining involves meeting one form of monopoly with another form, so that there may result what is known as bilateral government monopoly. Bilateral monopoly is a form of economic tug-of-war yielding results that depend on the same general forces that determine the outcome of any tug of war. The method of special agreement, therefore, should be employed only as a last resort, since it easily degenerates into economic warfare.

Economic warfare is not confined to government-to-government bargaining. Where there is substantial domestic monopoly, considerable cartelization of international trade, tariffrestricted processes in ordinary markets, and discriminatory bilateralism masquerading under quotas and exchange control, varying degrees of economic warfare may be found. Bilateral government monopoly is not likely to yield results differing materially from those that may occur under private trade languishing in a pathological condition.

# Multilateral Allocation of Imports

Now that the Soviet Union shares with the United States the position of being one of the two Great Powers of the world, much thought in the United States is being given to the matter of harmonizing Russian and other interests so that we may have an enduring peace. One problem is that of Soviet industrialization and the pressure on the standard of living of her people if her policy is one of autarchy—that is, the satisfying of her wants by producing everything at home. It is generally agreed that it would be in the interests of the Soviet Union and the world as a whole to meet the problem by borrowing the savings of the outside world to develop Soviet resources in a shorter time and with a minimum of sacrifice in living standards. It should also be mutually beneficial to continue the interchange of goods and services indefinitely according to the principle of comparative advantage.

The Soviet Union's monopoly of foreign trade, however, may prove to be the outstanding stumbling block. Since the Soviets have a planned economy and are likely to retain such a system in the foreseeable future, some writers have endeavored to find a trade formula that would reconcile, or largely reconcile, a Soviet foreign-trade monopoly, and its discriminatory potential, with a multilateral pattern of trade.

A suggested solution is that the Soviet Union should announce to the world at the beginning of each year its tentative plan for imports for that year. Supplying countries, as a group, then would agree upon a tentative distribution of the Soviet Union's imports among themselves. The Soviet Union

<sup>&</sup>lt;sup>1</sup> Gerschenkron, A., Economic Relations with the U.S.S.R., pp. 37-41. New York: Carnegie Endowment for International Peace, 1945.

would be protected pricewise by being guaranteed that the prices charged would be "in the vicinity of the world market prices." The supplying countries would also grant the Soviet Union MFN terms with respect to customs duties, quotas, and other import restrictions. As for the role of foreign traders, it is suggested that trade should proceed through the usual business channels. The program would consist, therefore, of the multilateral allocation of Soviet imports. But this procedure would not be permanent. After a certain number of years, the need for allocating imports would give way to the superior mechanism of trade within a broad multilateral framework.

Is this the solution to the problem? It is to be feared that the validity of the argument is as hard to swallow as is the high-sounding phrase "multilateral allocation of imports." In the first place, the proponents of the view admit that some discrimination could still be practiced "but its field would be considerably narrowed." A second and basic difficulty is that there is no indication of an objective basis, or the possibility of an objective basis, for the distribution of the Soviet Union's imports among competing supplying countries. How will the supplying countries agree among themselves upon shares of the Soviet Union's market? Is it not likely that the method of agreement will involve a species of horse trading which would be as distasteful as the possible consequences of Soviet Union trade-monopoly practices unhindered by international agreement? If something on the order of the representative-baseperiod formula is used, an objective rule will be established. But this rule becomes more and more arbitrary with the passage of time and the varying rates of technological progress in different countries.

Since there is no clear-cut presumption that the suggested solution would work, the world would have to reckon with the possibility of a sudden termination of the scheme by the Soviet Union. Such a development would probably have serious consequences. It seems best, therefore, to rely on the Soviet Union's interest in buying in the cheapest market as the most

flexible approach to the ideal state in which a nation's share of the Soviet Union's total imports is in proportion to the relative efficiencies of production. The future may evolve an international approach to the problem of foreign-trade monopoly in which the prospects for success look good at least on paper.

#### Summary

We first considered the structure of the Soviet foreign-trade monopoly. It was shown that the top layer in the structure, the Foreign Trade Commissariat, following the prescriptions of the over-all national economic plan, licenses exports and imports in order to permit the fulfillment of the plan. The licensees are the separate foreign trade combines, which operate through trade delegations or agencies (such as Amtorg) located in foreign countries. Following the discussion of trade structure, a section was devoted to the history of Soviet foreign-trade practices and policies from 1918 to the present.

For purposes of assisting in the evaluation of Soviet commercial policy, we discussed briefly partial state trading. This degree of state trading obtains when the government of a predominantly private-trading nation is itself a substantial importer or exporter of certain commodities or has a monopoly of the foreign trade in a limited number of goods. We found that several attributes of full state trading, as typified by the Soviet case, are to be observed when partial state trading prevails. Some outstanding features of partial state trading include (1) the common practice of not buying in the cheapest market, generally because of a desire to favor domestic suppliers, (2) the prevalence of the employment of buyer's monopoly power, and (3) discriminatory buying for the purpose of favoring one foreign source of supply over another.

We saw that there is a considerable discrimination potential inherent in the practices of full state trading, despite plausible assurances that the monopoly endeavors to buy only in the most advantageous market. The fact of the matter is that the best results are obtained by skillfully practicing discriminating

monopoly in buying. When such practices occur, the volume of international trade is less than the optimum, the optimum being measured by the total of transactions that would have occurred under competitive conditions.

The desirability of reconciling monopoly trading and multilateral trade has given rise to the suggestion that a nation with a complete foreign-trade monopoly, such as the Soviet Union has, should have the particular volume of imports which it desires allocated among the supplying countries multilaterally. That is, it has been suggested that, subject to appropriate safeguards, the monopoly-country's imports should be apportioned by agreement among the supplying countries. We saw that this is but a visionary proposal. Even if the monopoly country should approve of the scheme in principle, there is no fair and equitable, yet objective, basis on which to make such an allocation. The spirit of the good neighbor may perhaps prove to be a more reliable basis for harmonious trade relations between the Soviets and the rest of the world.

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#### Chapter 25

# Trade Policies of the United Kingd

THE past and future trade policies and problems of the United Kingdom are of special interest. A partial cause of such interest is that Great Britain is the largest single importer in the world and is compelled to live by trade to a degree which few Americans can envisage. Moreover, the United Kingdom has lately been experimenting with different trade policies. First, there was a long period of free trade following the Industrial Revolution, then came increasing tariff protection and discriminatory bilateralism during the 1930's, and now there is a promise of co-operation with the United States and an extension of multilateral trade.

#### The Free-Trade Era

The Industrial Revolution originated in Great Britain. From there it spread to France, Germany, the United States, and Japan. During the present century, a number of British Dominions and South American nations have begun to realize industrial aspirations. However, until World War I, the United Kingdom possessed a commanding lead over competitors in the field of textiles, iron and steel products, coal, and shipping. Britain could and did outcompete the other industrial nations in unprotected world markets as long as she could import cheap raw materials for her textiles and inexpensive food for her working population. International free trade suited British needs so exactly that it is not surprising that her economists and statesmen recommended free-trade policies for Great Britain and the world at large. Nor was it hard to

persuade most nations, for, being unable to produce industrial goods for themselves, they naturally wished to import them as cheaply as possible, besides desiring unobstructed access to the British market for raw materials and foodstuffs. Only a few nations, notably Germany and the United States, thought they saw an immediate industrial future for themselves and remained unconvinced, and listened instead to the arguments of such men as List and Hamilton. However, apart from these few exceptions, national self-interest and the enormous prestige of Great Britain brought the world a long interval of free trade.

#### Imperial Preference

The peculiar combination of circumstances that once favored Great Britain disappeared soon after the end of the nineteenth century. Petroleum began to displace coal as a world fuel. Other countries developed textile industries. Britain's competitive lead commenced to narrow, and she was slow to manufacture new-type products, such as automobiles and electrical equipment, on a mass-production basis. These developments led to political demands for protection of the new and relatively inefficient industries. Moreover, the farmers had never become reconciled to the sacrifice of British agriculture in the interests of industrial expansion. Accordingly, a tariff-minded minority has existed in Great Britain since 1900, and a small group of the Conservative Party always appealed to it at election time.

It was not until the onset of the great depression, however, that tariff building became politically profitable. In 1931 the financial scare over the pound sterling, which led to a general election and a Conservative-dominated coalition, returned many members to Parliament who were pledged to support tariffs. The threat to the pound also touched off an outburst of patriotic fervor which rendered tariff reform—that is. new and higher tariffs—especially palatable when prepared according to the imperial-preference recipe.

Consequently, when the comprehensive Import Duties Act was passed in the spring of 1932, Empire products were permitted to enter free for the time being. It was made clear, however, that the duration of this voluntary preference depended upon reciprocity on the part of the Dominions. apparent object of the British Government was to use this bargaining weapon to secure enlarged markets in those parts of the Empire possessing fiscal autonomy. Canada, economically the most important of all the Dominions, was more than willing to bargain along these lines. The Canadian Government was anxious to secure a larger share of the British market. for its raw materials and increased protection from American competition for its infant industries. Shortly afterwards, in the summer of 1932, representatives from Canada, Australia, South Africa, New Zealand, India, Newfoundland, and Southern Rhodesia, met at Ottawa to draw up a scheme of imperial preference. (Eire was not included as she and Great Britain were conducting a trade war at the time.)

There were two ways in which a system of Empire preferences might have been established. One would have been to lower or eliminate all save purely revenue duties on Empire goods. However, Empire Free Trade was out of the question because the major Dominions were anxious to foster domestic industries, most of which were unable to survive against full competition from the United Kingdom. (India had imposed a 15 per cent duty on British cotton goods as recently as 1930.) This ambition obviously stood in the way of tariff reductions by the Dominions. On the other hand, the new British duties were low, as judged by American standards, so that free entry for Empire goods did not always comprise a very significant preference. Accordingly, most of the intra-Empire preferences at Ottawa took the form of raising duty rates against foreign (non-British) countries.

The British Government, for example, committed itself to the following: (1) continuance of free entry for all Empire goods then being admitted without duty, (2) additional duties, the so-called Ottawa Duties, on various competing imports from foreign countries, (3) maintenance of existing preferences by guaranteeing not to reduce various duties on foreign products, (4) use of quota controls to give more of the British meat market to Imperial signatories, and (5) certain protections against Soviet dumping in the United Kingdom market.

The Canadian Government gave certain general undertakings, such as: (1) to protect the Canadian market against United Kingdom products only in the case of domestic infant. industries that were reasonably assured of sound opportunities for success, (2) to base the Canadian tariff "on the principle that protective duties shall not exceed such a level as will give the United Kingdom producers full opportunity of reasonable competition on the basis of relative cost of economical and efficient production," and (3) not to increase existing duties without inquiry by the Tariff Board as to their compatibility with this second principle, or before United Kingdom producers had been heard by the Board. The Australian Government did not make specific provision for any reductions in the British preferential rate, but merely guaranteed that British goods should enjoy certain minimum-percentage preferences. varying according to the general duty rate. The New Zealand Government, amongst other provisions, undertook to abolish a surtax against British goods, amounting on an average to about five per cent, which was imposed at the time the pound sterling was depreciated. South Africa, India, Southern Rhodesia, and Newfoundland made various concessions.

These Ottawa Agreements were made for a period of five years. Actually, Great Britain signed separate trade treaties with each of the Dominions, but generalized all concessions. The Dominions, however, did not always accord one another this same courtesy. Another Imperial Conference in 1937 added nothing new, and the arrangements of five years before remained in force.

The Ottawa system shifted the trade flows of the signatories.

Thus, the proportion of British imports coming from the Empire rose progressively as follows:

1930	29%
1932	35%
1935	38%
1938	40%

As regards specific commodities and countries, Canadian and Australian wheat displaced some from Argentina and the United States, New Zealand and Canada won some of Denmark's share in the British butter and bacon market respectively, and frozen Australian beef and New Zealand mutton gained ground at the expense of chilled meat from Argentina. The shift in exports from the United Kingdom was less marked.

It is safe to state that imperial preference had lost a great deal of its attractiveness by the outbreak of war in 1939. In fact, the trade treaties signed by Britain and Canada with the United States in 1938 probably marked a turning point in policy. The spreading disappointment over the Ottawa Agreements can be attributable to the following causes:

1. The Empire as a whole is on an export basis as regards a great many of the raw materials and foodstuffs produced by the Dominions. This is notably true of such commodities as wheat, wool, lead, jute, and cotton piece goods. Normally, competition among Empire producers will keep suppliers' receipts from these products, even within the protected import market of Great Britain, at the relatively low world level. In other words, the British price cannot exceed the world price plus the imperial preference rate, because if the net receipts obtained from sales to Britain ever became more attractive, other Empire producers would switch their offerings in the world market to the United Kingdom. The only important price gains of Dominion producers were for meat products, of which the Empire, owing to the heavy United Kingdom consumption, is on an import basis.

- 2. The consumers in the British Isles paid for imperial preference in higher food and living costs. This was particularly true in the case of beef, mutton, and pork products. However, this necessarily occurred to some extent in all cases where foreign sources of supply were partially dammed back in order to allow entrance to Empire products instead. Burdens of this kind were widely unpopular because they fell with greatest relative weight on people with low incomes.
- 3. There was a growing realization by Britain on the one side, and the Dominions on the other, that they had less to offer one another in the way of markets than had been optimistically expected. It became obvious to the British that the Dominions had no intention of reversing their march towards industrialization. And even some of the Dominions began to have doubts about the future of the British market; specifically, they feared that the population and prosperity of the United Kingdom were passing their peak. Britain and the Dominions suddenly awakened to the fact that about two thirds of their exports had always been sold outside the Empire.
- 4. Britain and the Dominions also discovered that they could not simultaneously maintain preferences and seek enlarged markets in foreign countries through mutual tariff concessions. Denmark and Argentina could hardly be expected to favor British manufactures while being discriminated against in their food exports. The Ottawa Agreements especially tied the hands of the United Kingdom Government. In this way, export opportunities were lost in important foreign markets for the sake of doubtful gains in Empire markets of less consequence.
- 5. Ottawa proved that trade negotiations can disrupt imperial solidarity. Britain felt that Canada had driven too hard a bargain, and *vice versa*. Since 1932, there has been a growing reluctance to debase the imperial connection by mercantilistic bargaining.

A great deal of the popular support behind demands for imperial free trade or tariff preference has been based on a

false analogy with the United States. The phenomenal growth and prosperity of America are often attributed abroad to its being the largest free-trade area in the world apart from the Soviet Union. Why should not similar benefits accrue to the British Commonwealth of Nations if all trade restrictions within the Empire were removed? In reality, there is not even a close parallel between the United States and the British Commonwealth in this respect. The United States is a comnact geographic region, whereas the British Empire is sprawled across the globe. Substantial imperial preference would, therefore, give rise to a great deal of unnecessary transportation expense. For example, most of Britain's timber comes from Scandinavia, whereas about three quarters of Canada's lumber would normally go to the United States: British dependence on Canadian timber would benefit no one but the shipping companies. Another fundamental difference between the United States and the British Empire is that the first is constitutionally incapable of erecting formal internaltrade barriers, whereas the major units of the British Commonwealth enjoy fiscal autonomy. Accordingly, American manufacturers have always been able to invest in mass-production methods with a confident expectation of volume sales in the future as well as the present. But manufacturers in the British Isles must face the risk of suddenly losing one or more Dominion markets owing to new protection, and vice versa; this is not a favorable environment for the attainment of largescale economies through long-term investment. The benefits of free trade within the United States are not valid arguments for free trade within the Empire.

# Discriminatory Bilateralism with Foreign Nations

The United Kingdom has been for many decades the greatest importer of all the nations. In 1938, her purchases of food, raw materials, and other products amounted to 4.5 billion dollars in value. Before World War II, the United Kingdom was the biggest customer of over thirty British and foreign

nations. During the long period of free trade, this quasimonopsony power necessarily remained latent. However, after the return of protection in 1932, the United Kingdom came into the possession of a new and powerful bargaining weapon. It was now in a position to grant entry into Great Britain in exchange for special preferences for British goods.

This policy was pursued with conspicuous success in the case of British negotiations with Argentina during 1933. The Argentine Republic exports a wide variety of meat and cereal products to European countries; but of these countries, only Great Britain could exercise appreciable monopsony power. In fact, in the case of chilled beef, which was the most important single Argentine export, Great Britain normally nurchased over 90 per cent of the shipments. However, the year before at Ottawa. Great Britain had promised the Empire countries an expanding share of the United Kingdom meat market, an undertaking having very ominous portents for foreign meat-exporting countries in general. Also, a fact of great practical significance was that the Argentinian estancieros, whose social and financial position ultimately depends upon the chilled-beef trade with Britain, were in the political saddle during the period in question. Finally, Britain normally had debit balances with Argentina, not only regarding merchandise trade, but also on current account; in other words, Argentina has been able to finance imports from North America and elsewhere out of the proceeds of her exports to the United Kingdom. All these circumstances enabled the British Government to exert strong pressure on Argentina with a view to securing special advantages for British goods and capital.

In May of 1933, a treaty was signed in London by Lord Runciman and Vice President Roca. This pact recognized the importance of the chilled-beef trade to the economic life of the Argentine and reserved 90 per cent of the British quota on this commodity for the Republic. In return, the Roca mission had to make many concessions, including the following:

- 1. Earmarking sterling exchange for the purchase of British goods. A crucial article of the Roca-Runciman pact, concluded during a period when Argentina was controlling her exchanges, required that:
- "... there shall be available ... for current remittances from Argentina to the United Kingdom, the full amount of the sterling exchange arising from the sale of Argentine products in the United Kingdom after the deduction of a reasonable sum annually towards ... the service of the Argentine public external debts ... payable in countries other than the United Kingdom."

Clearly this agreement constituted an attempt, through exchange control, to achieve almost complete current-account balance between the United Kingdom and Argentina. The one qualification related to the provision that a reasonable sum of sterling exchange could be applied to the servicing of federal, state, and municipal securities which were not British held. In practice, this annual diversion usually amounted to rather less than 10 per cent of the accruing sterling exchange. The treaty also provided for a British representative to be associated with the administration of the Argentine exchange control.

- 2. Favorable treatment of British capital. A rather vaguely phrased undertaking to accord British capital the most sympathetic treatment consistent with constitutional action resulted later in a number of practical benefits. One of these was that British-owned enterprises in Argentina were able to remit profits and interest home by purchasing sterling exchange from the Argentine control at the official (cheaper) peso rate. This privilege was not extended to American companies in the Argentine, which had to buy dollar exchange in the free market at a higher peso price, to the consequent disadvantage of American investors.
- 3. Tariff reductions on goods largely supplied by Britain. In a supplementary convention signed in September of the same year, Argentine customs duties were lowered on a long

list of manufactured goods and fuels of which the United Kingdom was the chief supplier. These reductions were of special value to Great Britain because at that time no other important industrial country received unconditional most-favored-nation treatment from Argentina. The Argentine had already agreed to keep coal, primarily supplied by Britain, on the free list.

British pressure upon Argentine authorities to favor additional imports from the United Kingdom until the attainment of current-account equilibrium continued after the Roca-Runciman pact came into force. This pressure was doubtless stimulated by the rising peso price of foreign exchange sold by the Argentine exchange control and the falling peso cost of foreign exchange available in the free market. (See Chapter 18 for an analysis of the official and free markets.) British consternation over this development arose from the fact that imports from the United Kingdom could be paid for with official exchange, whereas imports from North America and most other countries had to be financed through the free foreign-exchange market. This single circumstance had given British traders an advantage of slightly more than 20 per cent over their American rivals at the beginning of 1934. However. by the end of 1935 this advantage had fallen to about six per cent. It can hardly have been a coincidence that the Argentine Executive obtained authority in 1935 to levy an exchange surcharge of up to 20 per cent in excess of the official rate upon all imports undertaken without prior exchange permits. effect, this power was exercised so as to impose a 20-per-cent penalty duty on all imports from countries with which Argentina did not enjoy a favorable trade balance.

The main provisions of the Roca-Runciman trade pact were renewed in 1936. The British Government was again able to exploit the fears held by the politically dominant estancieros that they would lose a large part of the British market for chilled beef unless Argentina imported British goods and serviced British debts by an equivalent amount. It would

probably have been impossible for the British negotiators to secure such favorable provisions if the Argentine Government had represented other domestic interests more adequately or if other countries had been larger importers of chilled beef.

During the 1930's the United Kingdom was able to negotiate bilateral treaties granting it discriminatory preferences with a number of other countries for which it constituted an important market. For example, the United Kingdom is the largest single purchaser of Danish exports, and especially of its butter and bacon; consequently, in 1933 Denmark was induced to agree that the Danish central government would give first preference on public contracts to British suppliers, provided that their bids did not exceed the lowest by over 10 per cent, and would also influence municipal governments in Denmark to give priority to British firms and goods when purchasing. Great Britain, as one of the principal customers of Norway, Sweden, and Denmark, has been able in the past to negotiate especially advantageous treaties throughout Scandinavia.

This brief historical survey indicates that the United Kingdom was able to use its enormous buying power as a weapon to secure trade advantage for British goods and companies. The exploitation of this possibility had to wait upon the return of protection in 1932. For purposes of trade negotiations, Great Britain often relied heavily upon the argument that other countries should buy first from their best customer. The economic validity of asserting that merchandise trade accounts should balance is dubious to say the least. However, the bargaining power of such a doctrine, especially when asserted by the principal buyer, cannot be doubted at all.

# The Prewar Sterling Area

The importance of the British market to some nations has caused them in the past to link their own currencies to sterling. Gold redemption of the pound was terminated in 1931, and thenceforth, sterling began to decline in value as compared with the dollar. Depreciation of the pound placed those

nations which sold an appreciable percentage of their exports to the United Kingdom in something of a quandary.

Each of these nations realized that Great Britain was its biggest customer and that it had to compete with other nations in order to share this highly prized market. Thus, Denmark was in competition with New Zealand regarding butter, Norway with Canada over forest products, Egypt with India in the matter of cotton, and so forth. Each nation knew that if it allowed its currency to appreciate relative to sterling, which was falling in value, it would lose its United Kingdom trade to a competitor. None of the countries concerned could afford to take this risk during a period of depressed economic activity such as the world was then experiencing. Calculations of this kind were particularly compelling in the case of foreign countries, which now had to struggle against the Imperial preferences granted at Ottawa.

Table 32 lists those countries that can be considered to have been unqualified members of the sterling area in 1938. It also shows the sterling value of British imports by countries in the same year and the percentage importance of this trade in the total exports of each member nation. Argentina was a semi-detached member of the area. Great Britain was the best customer of all these countries with the unimportant exceptions of Thailand and Iraq.

What constituted membership in the sterling area? We consider this question fully in a later chapter, but for the present we may say that each member country (1) depreciated its currencies by approximately the same proportion as the value decline in sterling following its departure from gold, (2) subsequently maintained a stable exchange rate between its own currency and sterling, (3) kept a substantial fraction of its central-bank reserves in sterling claims rather than in the form of gold or foreign exchange of other kinds.

The creation of the sterling area was the result of separate action on the part of the individual nations concerned. Its existence was not based on any coercion from Britain, and its

duration rested solely on the continued willingness of the various governments to follow the fortunes of the pound sterling. The prewar sterling system did not involve exchange control or the pooling of dollar or other foreign exchange: it merely provided the convenience of exchange-rate stability throughout a large area and was based upon the self-interest of countries dependent on the British market.

TABLE 32
THE PREWAR STERLING AREA IN 1938 of (in million bounds)

COUNTRY	EXPORTS TO BRITAIN	PERCENTAGE OF TOTAL EXPORTS
UNITED KINGDOM		-
Australia	107	54
Denmark	68	56
Egypt	31	31
Eire	24	93
Estonia	6	36
Finland	37	45
India	155	38
Img	_	_
Latvia	9	43
New Zealand	46	84
Norway	39	28
Palestine	6 .	43
Portugal	10	22
Sweden	94	24
Thailand	_	
Union of South Africa	52	21

Sources: British Information Services, The Sterling Area, p. 3, October 1945; and Britain's Foreign Trade, p. 10, April 1945

The sterling area contributed important benefits to Great Britain. The willingness of other countries to devalue their monies in sympathy with the pound gave Britain more leeway to stimulate her exports by means of sterling depreciation. The major exports of the United Kingdom are industrial products which are normally in competition with those of the United States, Germany, and Japan. The other sterling-area countries are, in general, exporters of foodstuffs and raw

materials. Accordingly, whenever the gold value of sterling fell, British industrial exports improved their competitive position, but to the extent that the sterling-area countries depreciated their currencies proportionately, the cost of food and materials imports remained almost the same. In this way the United Kingdom was able, in part, to exploit the dependence of many small supplying nations upon the British market.

# The Anglo-American Trade Agreement of 1938

The United States and the United Kingdom are the two leading exporters of the world, and many of the manufactured products they sell are in competition with one another. Since 1933, the United States, which was then a high tariff country, had been attempting to reduce trade barriers through its Reciprocal Trade Agreements program (discussed in the next chapter), and to render the tariff more multilateral by always negotiating for mutual and unconditional most-favored-nation treatment. Since 1932, the United Kingdom, which prior to that date had followed an almost protectionless policy, began imposing import restrictions and concluding plans for discriminatory preferences with a number of British and foreign countries. It was evident during the middle 1930's that these two countries were following different policies which might lead to diplomatic conflict.

The Anglo-American trade agreement of 1938, accordingly, possessed unusual significance because it marked a shifting of British trade policy into greater conformity with that of the United States. The British tariff was rendered less discriminatory. The United States ceased to be at a disadvantage with other foreign countries in respect to most commodities. Moreover, the treaty eliminated Imperial preferences on wheat and various other important products. Thus, the cause of multilateral trade was considerably advanced.

The money value of the trade flows involved also made the 1938 treaty noteworthy. The United Kingdom was the largest est customer of the United States, and America was the largest of Britain's suppliers. It was felt at the time that the liberalization of commerce between these two countries would in turn lead to augmented trade flows in other parts of the world system. For example, the trade of the United States, Great Britain, and the Empire (omitting Canada) is of a triangular nature, with each selling more to the next than it buys in return; it was hoped, therefore, that if Anglo-American trade were freed, goods would also move in greater volume between the United States and the rest of the Empire, and between the Empire and Britain.

The outbreak of war in Europe in September of 1939 nullified the beneficial results expected of the treaty. However, the attitude of mind which led to the treaty's negotiation has persisted through the war. The postwar policy of the British Government still appears to be that multilateral world trade is sufficiently valuable to warrant the cost of foregoing Imperial and other preferences should this prove necessary.

## Postwar Struggle for Economic Survival

Later-day historians may observe that Britain suffered a severe economic defeat in the war with Nazi Germany. The international position of the United Kingdom was already vulnerable in 1938, and had in fact been gradually deteriorating since World War I. A second world war within a quarter century has stripped Great Britain of financial reserves accumulated by previous generations. These reserves were of vital importance because it is uncertain whether Britain retains the economic virility or peculiar advantages of a hundred years ago.

The prewar balance of payments of the United Kingdom is set forth in Table 33. The figures are annual averages computed for the three-year period 1936 to 1938 inclusive. The most striking aspect of this presentation is that Great Britain was financing only 56 per cent of her imports by means of exports. The remaining 44 per cent was paid for in various ways. *Invisible* net income from overseas investments, ship-

ning services, and commissions and insurance financed 39 per cent of all imports. Disinvestment accounted for the remaining five per cent. In a sense the United Kingdom was living slightly beyond her current means, but her foreign investments sufficed to make this possible for some time to come

TABLE 33 BRITAIN'S AVERAGE BALANCE OF PAYMENTS, 1936-384

	MILLIONS OF POUNDS	PERCENTAGE OF IMPORTS
Merchandise imports 5.	884	100
Merchandise exports 6	496	56
Excess of imports	388	44
Net investment income	203	23
Net shipping income	105	12
Net commissions, insurances, etc	37	4
Net miscellaneous income	3	Ō
Invisible net income	348	39
Over-all debit balance	40	5

Six years of war inflicted both permanent and temporary injuries upon the British economy. One of the gravest and most lasting of these was on international capital account. Despite the generous help of Lend-Lease from America and Mutual Aid from Canada, the United Kingdom has become a debtor nation for the first time in history. The British war effort exceeded the economic potentialities of the United Kingdom in that the armed services of Great Britain required more materials and armaments than the home economy could produce or obtain in exchange for exports. Such desperate efforts were possible, for a time, because the British had overseas investments to sell and because countries like India and Egypt were willing to accept sterling credits. In 1939 Great Britain owned about 4.25 billion pounds' worth of foreign securities and investments, but over one billion pounds' worth of high-yield assets have now been sold, and the proceeds spent.

Source: Statistical Abstract of the United Kingdom, 1936-38.
 Excludes 66 million pounds a year of entrep6t trade.
 Includes seven million pounds a year of net government expenditures overseas.

British short-term debts to foreign countries incurred for the prosecution of the war have increased by about four billion pounds. These two changes have obviously imparted an adverse shift to Britain's net income from investment. It has variously been estimated that gross income from overseas holdings will decline by at least 80 million pounds. In addition, if three quarters of the blocked sterling balances are funded at two per cent, there will be an extra gross payment of annual interest amounting to 60 million pounds. This total deduction of 140 million pounds would leave a net income from overseas investments of not over 60 million pounds a year.

Shipping income also was less after the war. The British merchant marine was a fourth smaller at the time of the armistices. In the meantime, the shipping fleets of other Empire countries have increased by about the same absolute tonnage and can be expected to compete directly on the same routes. The American merchant marine has expanded prodigiously and constitutes a more indirect but still serious threat to British shipping income. A fair estimate would be that postwar shipping income will be reduced by at least 25 million pounds.

The immediate effect of the war on the British merchandise trade balance threatened to be substantial and adverse. The total wartime deferment of equipment maintenance and personal consumption in Great Britain was enormous. The building of new homes, the producing of furniture, and the making of clothes required the importation of lumber and fibers on a vast scale. The renovation of British railways, factory equipment, and public works demanded a large share of available energy. However, undue concentration on domestic rehabilitation would leave the export trade at the low level of about 200 million pounds to which it had fallen by 1945 (in terms of 1938 prices).

These adverse shifts in net investment income (140 million pounds), shipping income (25 million), and export trade (350 million) could not long continue in addition to the capital debit

of 40 million prevailing before the war. This would entail an aggregate deficit on current account of over 500 million pounds annually. British holdings abroad could not sustain such a draught for many years.

In 1945, the British Government had to enforce an austerity program for the United Kingdom. The volume of consumption imports were controlled in one way or another. The government had to keep many resources out of production for the home market and thereby force them into the export trades. One method was to maintain domestic rationing for several years. In any event, the plane of living in Great Britain will remain at wartime levels until the fight for exports is on the way to being won.

It has been estimated that the United Kingdom will have to increase the volume of exports by 50 to 75 per cent over 1938 if it is to preserve current-account balance and to attain prewar consumption levels again. This figure is high because British exports are made in large part from imported raw materials. In many respects Britain is a workshop, and this is nowhere more evident than in the case of cotton goods. Consequently, an increase in exports raises imports also, although not proportionately, and this narrows the net contribution of exports to Britain's balance-of-payments needs.

Nobody knows whether the United Kingdom can achieve an export goal of this magnitude after reconversion is completed. One imponderable is the state of world prosperity. Britain's exports are heavily weighed with capital equipment and consumption luxuries, and the possibility of selling such articles is dependent upon high levels of real income for the world. On the other hand, the British terms of trade tend to deteriorate with world prosperity. The proportionate movement up and down in the prices paid by Britain (such as for wheat and cotton) is greater during periods of prosperity and depression respectively than the prices received by Britain (such as for chemicals and vehicles). However, in the final analysis, the United Kingdom, especially when the income on its remaining

overseas investments is taken into account, probably stands to benefit from world prosperity.

A graver uncertainty is the future competition which British exports will have to face in foreign markets. The industrial rivalry of Germany, Japan, and Italy have been removed for an indefinite period, but that of India has increased. The economic power of the United States in many lines of production is greater than ever. Provided that such sales can be financed through the International Fund and Bank, parts of the European continent should provide a strong temporary market, and Britain can probably reconvert more rapidly than countries such as France.

In the long run, the level of British exports will depend upon her ability to secure import preferences in other markets or upon a general relaxation of import barriers throughout the world. Here are two divergent paths which the United Kingdom might follow. Either Britain can aggressively bargain her home market for preferences in the markets of her more dependent suppliers or she can join with the United States in favor of a multilateral relaxation of tariffs and quotas. The former choice would entail perpetuation of the sterling area in its rigid wartime form; channelized trade with selected areas such as Australia. Scandinavia, and temperate South America; and global rivalry with the United States. The second alternative would involve co-operation with the United States in the task of lowering trade barriers, removing unique preferences, and financing backward areas which justify development.

This is a very hard choice to make. An influential minority in the United Kingdom feels that Britain can never compete with the United States on even terms in third markets. It believes that Britain should use to the hilt the one remaining weapon of unequalled purchasing power which she still possesses. This minority asks why Britain should give up the preferences she enjoys while the United States continues its high and often needless tariffs and subsidies. American poli-

cies and levels of business activity have the reputation of being unpredictable and being factors making for instability.

However, the majority view in Britain at the time of the armistices favored continued co-operation with the United States in peace as in war. The British government had already played a leading part in devising such world institutions as the International Fund and Bank. Moreover, official economists, such as Lord Keynes, doubted whether a narrow bilateralism would in fact be practicable; in his words, this minority policy would "build up a separate economic bloc which excludes Canada and consists of countries to which we already owe more than we can pay, on the basis of their agreeing to lend us money they have not got and buy only from us and one another goods we are unable to supply."

The issue was decided in Great Britain by the cancellation of Lend-Lease and the terms which the United States attached to the British loan. The sudden end of hostilities abruptly cut off Lend-Lease foods and raw materials upon which the British economy had been sustained. The anticipated delay between V-E and V-J days, which would have permitted partial reconversion, failed to materialize when Japan admitted defeat a few months after Germany. Food and raw-materials imports could not be deferred for a year or two until reconversion was completed and the export trade restored. An immediate and large financial loan in the most generally usable money was a necessity which nobody could deny. The only country on earth able to grant such a loan was the United States.

The British loan negotiated during 1945 in Washington called for a line of credit amounting to 3.75 billion dollars to be available until the close of 1951. Also, the entire Lend-Lease program was written off by Britain's acknowledging an indebtedness of .65 billion dollars for goods already shipped but not consumed during the period of hostilities. The total loan of 4.4 billion dollars is to be serviced in 50 equal and annual

installments beginning at the end of 1951. Interest will be charged at two per cent commencing in 1951, and payments on this account will be included in the annual installments. A novel feature of the arrangement is that the annual interest is fully and finally waived for those years when Britain's receipts from goods sold abroad plus net service income fall below the prewar volume. This will be an especially important provision at the outset, for then interest payments will still constitute most of the annual installment. The 3.75-billion-dollar line of credit is not a tied loan. It can be used to purchase goods and services from any third country.

The above loan was offered by the American negotiators on the understanding that Great Britain would adapt certain of her policies to those of the United States. The United Kingdom agreed to relax wartime-exchange controls within a year so that countries can freely dispose of their sterling receipts from current trade and service transactions. Discharge of this obligation means the end of restrictions in the use of dollars by sterling-area countries, and the emasculation of the sterling area as it developed during the war. Britain also undertook to make agreements for an early settlement of the blocked-sterling accounts on the basis of a partial write-off and repayment of the balance by installments. The United States and the United Kingdom mutually agreed not to impose discriminatory import quotas, joined each other in sponsoring an International Trade Organization, and expressed their intentions to remove discriminatory trade barriers. Great Britain has thus been induced to subscribe to American views on world trade in order to secure the financial wherewithal to recover from the sacrifices imposed by the war effort.

The political strings attached to the British loan are not altogether resented in the United Kingdom. If America is granting the loan on political terms, it is also true that British acceptance is based in part on political considerations. Britons are now prepared to recognize that the future security of

the British Isles, Commonwealth, and possibly Empire, will depend upon a closer association of the English speaking peoples.

#### Summary

Long the seat of world free trade, which once suited her interests well. Britain shifted to protection between World Wars I and II. This protection was combined with Empire preference almost from the beginning. The Dominions and Colonies obtained the right to export raw materials to the United Kingdom at rates of duty which were lower than those imposed upon outside countries. A system of extensive twoway preferences was formalized at the Ottawa Conference of 1932. The main result of this meeting was that the Empire countries raised duties against outside countries in order to grant tariff concessions to goods of British or Empire origin. This Conference may be said to be the beginning of an attempt to isolate the Empire partially from the world economy. Some success was achieved in redirecting British purchases more and more to Empire sources, but the increase in United Kingdom exports to imperial countries was less marked.

While the system of discriminatory frade with the Empire was being pursued under the banner of imperial preference, Britain also carried out various schemes of discriminatory bilateralism with a number of outside countries. We illustrated how these bilateral arrangements worked in terms of the Anglo-Argentine agreement of 1933. In essence, Britain used the threat of excluding or further restricting the entry of Argentine goods into her market as a device with which to extract discriminatory trade concessions from the Argentine authorities.

A shift in British trade policy occurred in 1938 with the signing of the Anglo-American trade treaty. This treaty called for the lowering of many tariffs by both countries and the elimination of some Imperial preferences, and promised a lessening of British discriminatory restrictions in the interests

of multilateral trade. At the conclusion of the war in 1945, Britain agreed to an even more liberal trade policy as one of the conditions for reaching an agreement with American officials for a 4.4-billion-dollar loan. The postwar period thus opened with the world's two greatest commercial nations favoring an international trading system in which there is a decent regard for the economic rights of all nations.

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### Chapter 26

# Commercial Policy of the United States

THE commercial policy of the United States has always been predominantly tariff policy. Nontariff restrictions upon trade have been comparatively few in number and only of relatively recent adoption. In fact, of the world's greatest trading nations, only the United States may be said to rely on the tariff to the virtual exclusion of other devices for restricting imports. It will be observed that we speak of the virtual exclusion of other trade-restricting devices. This is because the United States makes some use of quota restrictions on trade, but these are principally of the comparatively mild tariff-quota type. On the other hand, the more severely restrictive and discriminatory devices, such as allocated quotas. compensation agreements, clearing arrangements, and payments agreements, have never been employed during peacetime. Why, it may be asked, has the United States relied so heavily on the tariff? We shall find that the answer is partly historical and partly the result of the character of our internal economy and our relative economic independence of other nations.

#### Historical Sketch of the American Tariff

We have been tariff-conscious from our beginning as a nation. Thus Secretary of the Treasury Alexander Hamilton was directed in 1790 to outline a program for the encouragement and protection of domestic manufacturing. His famous report on manufactures, which presented the theoretical basis for protection, stressed such views as military self-sufficiency,

protection of the home market, and the infant-industry argument. Hamilton's report was a powerful plea for protection, yet it evoked comparatively little popular support at the time. The American economy was still predominantly agricultural, so that most individuals were much more interested in cheap imported manufactures than in building up domestic industry.

Manufacturing in the United States was not greatly stimulated until the time of the European wars following the French Revolution. It is well known that during most major wars, young countries dependent upon imports find that their domestic industry is greatly encouraged by interruptions in the flow of trade. Napoleon's attempt to exclude British trade from the Continent, and the retaliatory British blockade of the European mainland, led in time to the American trade embargo. For some years, therefore, nascent domestic industry enjoyed the most extreme form of protection—cessation of imports. American prices skyrocketed, and numerous highcost industries mushroomed. Both agriculture and industry were adversely affected, however, by the termination of the wars. Relief was sought in the form of tariff protection, the Tariff Act of 1816 being the result. By later standards, however, the tariff rates under this Act were low. Additional increases in rates were effected in 1824 despite opposition from interests in the South and the commercial classes of New England, but it was not until 1828 that high rates of duty were imposed.

The Tariff Act of 1828, however, was poorly considered and became the target of vehement criticism from the opposition, particularly in the South. (The Cotton South, which sold its goods mainly in free world markets, was consistently opposed to greater domestic protection because increased protection was identified with higher prices for manufactures.) Calhoun, the vigorous exponent of the position of the South, led a successful revolt against the law, and in 1832 lower rates of duty prevailed once more. But some opponents of protection were still unsatisfied, especially as regards the constitutionality

of tariff-making by Congress. South Carolina, for example, went so far as to pass a law in 1832 nullifying the national Tariff Act of 1832 as it applied to that State. The contention was that Congress exceeded its rights under the Constitution. But by this date too many interests were dependent upon protection, and in any case, one's views of the matter depended on how one interpreted the Constitution. The issue was temporarily settled in the Compromise Tariff of 1833, which removed some duties and called for a reduction of all of the remainder to a maximum of 20 per cent during the next 10 years.

This ambitious program had hardly begun, however, when there occurred a general decline in business as a result of the currency and banking difficulties of 1837. Since customs duties constituted the government's principal source of revenue, the protectionists seized upon the situation in 1841 to enact higher duties for revenue purposes. But duties averaging 30 per cent, and frankly protective in purpose, were embodied in the Tariff Act of 1842. During the next few years, however, the improvement in general business carried with it a desire for reduced duties. The result was a general lowering of tariff rates in the Tariff Act of 1846. Another cut in duties occurred with the passage of the Tariff Act of 1857, when the average rate fell to the lowest level since 1816.

The Civil War period was most propitious for increasing protection to industry. The tariff-minded Republicans now were virtually without opposition owing to the secession of the South. War expenditure necessitated greater revenues, so that internal taxes had to be increased. And higher tariff rates were deemed necessary both to offset the increased taxes on domestic manufactures and to obtain greater revenues. These circumstances were clearly reflected in the high-duty Tariff Acts of 1862 and 1864. Moreover, the weakened postwar position of the South was a prime factor in delaying the reduction of protection for many years to come. During the remainder of the century, fluctuations in the level of duty rates

varied approximately inversely with the level of business activity—rates would go up in depressions and fall in better times. This period also saw (1) an increasing application of protection to agriculture, especially wool, and (2) a provision in the Tariff Act of 1897 (Dingley Tariff) for reciprocity arrangements with foreign countries.

During the first three decades of this century, Congress passed three major tariff acts. The first, that of 1913 (Underwood Tariff), following victory of the Democratic party at the polls, resulted in the largest reductions in rates in fifty years. The second was the Tariff Act of 1922, which restored high protective rates, especially on agricultural products. This shift to increasing protection for agriculture obviously reflected the growing belief in the maturity of American industry and the correlative decline in the comparative efficiency of our agriculture considered as a whole. Despite the Tariff Act of 1922, our agriculture remained depressed during the generally prosperous 1920's, mainly because of the dislocation of agriculture following World War I. This situation set the stage for the third major tariff act, the Tariff Act of 1930 (Smoot-Hawley Tariff), originally designed mainly to aid American agriculture. But contrary to the original intention of Congress, the legislation actually achieved the highest general tariff on record. This tariff was not received favorably at home or abroad, and with the onset of the great depression, the stage was set for an attempt at thoroughgoing tariff reform -the American trade agreements program.

# The Fight Against Discrimination

Before we take up the trade agreements program, a word is in order concerning the antidiscrimination tools employed in American commercial policy. As the reader will recall from Chapter 23, the United States was relatively unconcerned with equality of commercial treatment before 1922 because we then adhered to the conditional form of MFN. It has been only subsequent to 1922, after we had shifted to the

unconditional form of the MFN clause, that American policy has stressed opposition to discrimination in trade. Today, the United States is the leading champion of equality of treatment in international commerce. In addition to the unconditional MFN clause, there are other means of combating discrimination in international trade, as we shall see presently.

In the field of international economics, the concept of discrimination is used in two senses. There is, first, the meaning with respect to differential barriers to foreign trade in the same commodity or service. In the second place, there is the meaning that may be called the *technical* one, namely, that which relates to monopolistic price practices as engaged in either by a state trading monopoly or by a private monopoly, such as an international cartel.

We have seen in our previous discussion that discrimination in the form of differential or nonuniform barriers to trade may arise in numerous ways. British Empire preference which taxes, for instance, a non-Empire textile product at five or six times the duty payable on a product of British origin, is an outstanding case of trade-barrier discrimination. Similarly, there are many forms of discriminatory trade treatment involved in some national tariffs and, as we have seen in previous chapters, in quota restrictions and in most exchange control schemes. The preferential arrangements existing between the United States and Cuba represent still another form, though of relatively less importance. Unfortunately, many of the world's discriminatory trade measures are directed against the international trade of the United States. has been so because of our high tariff, our relatively small import-bargaining power owing to the intimate connection between the volume of imports and the level of business activity at home, our customary favorable balance of trade, the diplomatic and other pressures exerted against smaller states by other trading nations, and the general failure to achieve over-all adjustment to changing economic circumstances. Although American policy is responsible for some of the basic difficulties from which trade discrimination arises, with the result that we are not free from criticism, most of the discriminatory practices in foreign trade are traceable to the behavior of European countries. These practices represent unwarranted and self-aggravating causes of international ill will.

In combating trade discrimination directed against the commerce of the United States, several devices are employed. First and foremost is the unconditional MFN principle, which has been basic in United States commercial policy since 1922. The appeal to the rule of equality of treatment places major reliance on the MFN clause. A second device is the presidential power, derived from the Tariff Act of 1922, to impose duties that penalize countries that discriminate against American goods. Thirdly, a device closely related to the second consists of the presidential power, derived from the Trade Agreements Act of 1934 (discussed later in this chapter), to withhold tariff concessions from any country found to be discriminating against United States trade. Under this authority, both Germany and Australia were blacklisted, or deprived of the benefits of lower tariff rates, resulting from the tradeagreements program.

In order to embark on a discriminatory trade program, Germany in 1934 requested the cancellation of the MFN pledge in the United States-German commercial treaty of 1923. As a result of this, Germany in 1935 was deprived of the benefit of favorable trade-agreement tariff rates. In 1936 Australia was similarly deprived of lower rates of duty because of her refusal to issue licenses for the importation of American goods unless such goods could not be purchased from countries with which the Australian trade balance was favorable. (A full discussion will be found in Chapter 29, but it may be pointed out briefly here that Britain and the so-called sterling-area countries are resorting to a similar form of discrimination, but apparently only during the immediate postwar transition period. This discrimination takes the form of requiring all members of the

sterling area to refuse to buy goods and services from nonsterling-area countries, more or less despite considerations of price, if such goods can be purchased from sterling-area sources.)

A fourth device used to combat discrimination against United States trade is a seemingly foolproof statistical formula: the representative-period formula, used particularly with reference to discriminatory treatment taking the form of quota and exchange-control restrictions. In cases in which foreign countries have imposed especially restrictive regulations against imports of goods from the United States. our policy has been to attempt to persuade the foreign countries in question to allocate licenses for American goods in order that imports from the United States would bear the same ratio to total current imports that imports from the United States bore to total imports in some past representative period. Administratively, however, it is difficult to determine to everyone's satisfaction just which past period may be regarded as typical or representative, since so many special circumstances account for year-to-year movements in the national distribution of any country's trade. Analytically, any given past period, assuming that agreement is reached as to its representative character, becomes more and more arbitrary a criterion as it recedes into the past. This is because of the changing importance, over time, both of the composition of any country's imports and the competitive position of each supplying nation with respect to other supplying nations, and with respect to domestic production in the importing country. The representative-period formula for attacking the problem of discrimination thus provides at best only limited relief, leaving the basic difficulty substantially unchanged. As in so many other cases, this formula provides only a temporary excuse for avoiding basic adjustments all round.

We turn now to the second form of discrimination, that which relates to monopolistic or monopsonistic practices.

Consider first the case of nondiscriminating, uncontrolled monopoly. Whenever the foreign demand for any of a particular country's exports or the foreign supply of any of its imports is less than infinitely elastic, the country enjoys some measure of monopolistic power. It may change the prices of imports and exports by varying the quantity which it buys or sells. The reader may readily visualize this result by contrasting sloping (monopolistic) demand and supply curves with horizontal (infinitely elastic) curves—the price in the former cases is different for different quantities bought and sold. Just as the monopolist in the domestic market gains what the rest of the community loses when his monopoly power is employed, so in the international field the monopolistic country gains what society as a whole loses. The monopolistic, or rather, the monopsonistic country, by importing a commodity only to the point at which marginal cost equals marginal revenue (which is less than the home selling price), will buy less than the optimum quantity of foreign goods. The optimum quantity of imports obtains when the marginal landed cost of the imported item equals the home price. Such a state of equality means that goods are distributed solely on the basis of relative costs.

When, however, a country's purchases influence price in such a manner that additional purchases raise the price or average cost of the goods, the marginal cost of imports to the country will exceed the selling price. In such a case, imports will be smaller than under strictly competitive conditions because goods will be imported only up to the point at which marginal cost equals price. Less than the optimum quantity of goods will be produced abroad and more than the optimum at home. Similarly with respect to monopoly exports. If the selling country can influence price, raising it by selling less, marginal revenue will be less than price and the quantity sold will be below the quantity that would have been sold under strictly competitive conditions. The monopolistic country will stop

selling when marginal cost equals marginal revenue, which is less than price. Marginal revenue and price would be identical, however, under strictly competitive conditions.

Discriminating monopoly differs from the foregoing by virtue of the monopolist taking advantage of the special elasticity features of each market or country in which he operates. In addition to the usual objections to simple uncontrolled monopoly, discriminating monopoly generally is open to the objection that the treatment is both onerous and unfair as between the various parties being served. Although discriminating monopoly seems destined in the future to prove more disturbing to non-state-trading countries than it has in the past, little has been evolved in the field of commercial policy to cope with the problem. To date, steps which have been taken against discrimination have not yielded encouraging results.

The publicly announced intentions of a number of governments, however, offer some measure of encouragement. Thus, in 1941, during one of the darkest hours of World War II, the President of the United States and the Prime Minister of Great Britain subscribed to a few basic principles known as the Atlantic Charter. These principles were subsequently approved by many other governments. The principle which is relevant to the present discussion indicates that the two states

"will endeavor, with due respect to their existing obligations, to further the enjoyment by all States, great or small, victor or vanquished, of access, on equal terms, to the tradand to the raw materials of the world which are needed for their economic prosperity."

An even more specific declaration of purpose is contained in Article VII of the Master Lend-Lease Agreements which were signed with most of the United Nations. In the Agreement of February 23, 1942, between the United States and Great Britain, this Article reads as follows:

"In the final determination of the benefits to be provided to the United States of America by the Government of the United Kingdom in return for aid furnished under the Act of Congress of March 11, 1941, the terms and conditions thereof shall be such as not to burden commerce between the two countries, but to promote mutually advantageous economic relations between them and the betterment of world-wide economic relations. To that end, they shall include provision for agreed action by the United States of America and the United Kingdom, open to participation by all countries of like mind, directed to the expansion, by appropriate international and domestic1 measures, of production, employment, and the exchange and consumption of goods, which are the material foundations of the liberty and welfare of all peoples; to the elimination of all forms of discriminatory treatment in international commerce, and to the reduction of tariffs and other trade barriers; and, in general, to the attainment of all the economic objectives set forth in the Joint Declaration made on August 14, 1941, by the President of the United States of America and the Prime Minister of the United Kingdom.

"At an early convenient date, conversations shall be begun between the two Governments with a view to determining, in the light of governing economic conditions, the best means of attaining the above-stated objectives by their own agreed action and of seeking the agreed action of other like-minded Governments."

It remains to be seen just how these fine principles will be implemented by the United States and the various governments which among themselves obtained about 40 billion dollars of American aid during World War II.

#### The Trade Agreements Program

The United States in 1934 attempted to reverse the world trend toward the multiplication of restrictions on trade. After having employed the single-column, unilaterally imposed tar-

<sup>&</sup>lt;sup>1</sup> This language has been construed by some observers to mean that a country like the United States cannot insist upon nondiscriminatory trade policies by others if a full employment policy is not properly implemented by the United States.

iff-rate system almost without exception since the founding of the nation, the United States abandoned this system in the second year of the first administration of Franklin Delano Roosevelt. In its stead there was adopted the system of tariff reciprocity incorporating unconditional MFN treatment as a basic element. Tariff reciprocity is in contrast with the system of tariff making in which rates of duty are constructed and put into effect unilaterally. In every respect other than the manner in which they are negotiated, however, the trade agreements constitute a type of multilateral trade policy. Bilateral or reciprocal agreements that are extensible without discrimination under the unconditional MFN clause, that are reached by the executive branch of the government under specific authority delegated by Congress, and that involve a double-column tariff, constitute the central elements of the United States trade-agreements program. The statutory authority for the trade-agreements program is the Reciprocal Trade Act of June 1934.

It has long been believed that Congressional tariff making and the operations of minority interests or pressure groups have been responsible for a persistent upward bias in tariff rates. A more objective approach based on national or general interests was sought to the problem of tariff adjustment. It was felt that qualified personnel in the executive branch of the government, acting in co-ordinated fashion on the basis of the most authoritative data and expert advice, would be able to offer a more rational attempt to expand American participation in international trade. The United States, through the tradeagreements program, would aim to expand world trade by simultaneously expanding imports into the United States and exports to other countries. Trade agreements, incorporating the unconditional MFN clause, would be negotiated with individual countries to achieve this end.

What are the salient features of the Reciprocal Trade Act of 1934? First, the President is empowered to lower or raise the then-existing duties by 50 per cent. Secondly, he is specifi-

cally forbidden to transfer dutiable commodities to the free list or vice versa. Thirdly, unconditional MFN treatment is to be provided. Fourthly, reciprocal treaties embodying changes in duties take effect upon proclamation by the President; ratification by the Senate is not required. Fifthly, authority to enter into such agreements is granted for a period of three years.

The mechanics of implementing the trade-agreements program are comparatively simple. When negotiations for a trade agreement with a particular country are about to be undertaken, public announcement is made of the fact. Interested traders and producers then are notified about the commodities in which the United States proposes to make duty reductions. Parties which feel that they will be injured are requested to appear at public hearings conducted by the Committee for Reciprocity Information, at which meeting their views may be made known. Information gathered at these hearings is then presented for consideration by interdepartmental committees which have been studying all available data bearing on a possible agreement. These committees propose reductions in duties that will be requested of the foreign country with whom negotiations are under way, as well as duty reductions which the United States is prepared to grant. In order that a bargain may be struck, duty reductions are confined to commodities in which the other country is the major supplier. The result is an enumeration, commodity class by commodity class, of concessions to be sought and concessions which may be granted. When these reciprocal concessions are finally agreed upon by the relevant committees and the foreign government, a trade treaty is signed by the President, and new rates of duty go into effect.

All along the line, the particular interests of different groups of Americans are considered, with an eye to the broad national interests as well as to the temper of Congress. Representatives on the interdepartmental committees often transmit, indirectly and by subtle means, the wishes of particular lobbies.

The Department of Agriculture frequently pleads the case of the farmer,<sup>2</sup> the Tariff Commission occasionally takes the side of protected industry, and the Department of Commerce seeks to improve the position of American exporters. Now and then letters from belligerent senators or congressmen, or even from some cabinet members, serve to influence decisions. By and large, however, the trade-agreements procedure represents a real improvement over the logrolling tactics of Congress in tariff matters.

During the first eleven years of its operation, the tradeagreements program involved agreements with 28 countries. The names of the countries with which agreements have been signed and the dates on which the agreements became effective are given in Table 34.

Through 1944 the United States had made concessions to foreign countries consisting of (1) the binding of existing duties or the binding of commodities on the duty-free list (binding is an act which freezes a given type of tariff treatment, and in the case of low tariffs or free-list items, is thus regarded as a favorable act by the foreign country with which an agreement is being negotiated) and (2) reductions in rates of duty. Rates of duty have been reduced in 1,226 cases, as follows:

Size of Reductions	Number of Rates Reduced
0 to 25 per cent	230
26 to 39 per cent	266
40 to 49 per cent	179
50 per cent	523
Variable reduction	28

<sup>&</sup>lt;sup>2</sup> Secretary of Agriculture Wickard, however, made a good point before a committee of the House of Representatives in 1945 when he emphasized the farmers' stake in high employment and a large volume of imports and exports. He pointed out that although agricultural imports are a greater share of total American sales of farm products in good years than in bad, the percentages being respectively about 10 and 7, American farmers are better off when they have 90 per cent of a 12-billion-dollar market than when they have 93 per cent of a 6-billion-dollar market.

At the time of the passage of the Trade Agreements Act of 1934, the average equivalent ad valorem of rates assessed against dutiable imports was about 50 per cent. Because of the reciprocal trade agreements, the average equivalent ad valorem declined to 37 per cent over the period 1935-1943.

TABLE 34
TRADE AGREEMENTS SIGNED

<del></del>
Cuba September 3, 1934
Belgium and Luxembourg May 1, 1935
Haiti June 3, 1935
Sweden August 5, 1935
Brazil January 1, 1936
Canada (superseded) January 1, 1936
Netherlands February 1, 1936
Switzerland February 15, 1936
Honduras March 2, 1936
Colombia
Guatemala
France June 15, 1936
Nicaragua October 1, 1936
Finland November 2, 1936
El Salvador May 31, 1937
Costa Rica August 2, 1937
Czechoslovakia April 16, 1938
Ecuador October 23, 1938
United Kingdom January 1, 1939
Canada (second agreement) January 1, 1939
Turkey May 5, 1939
Venezuela December 16, 1939
Argentina November 15, 1941
Peru July 29, 1942
Urugusy January 1, 1943
Mexico January 30, 1943
Iceland November 19, 1943
Iran June 28, 1944

Despite the rate reductions under the trade agreements program, however, the average equivalent ad valorem of rates imposed on dutiable imports was still materially above the 1914-1920 level of 26.9 per cent.

It is necessary to enter a word of caution as regards the interpretation of statistics concerning the average ad valorem equivalent of rates on dutiable imports. Specifically, it is not

always correct to interpret a reduction in the average ad valorem equivalent of duties to mean that a tariff is becoming less restrictive of imports. Statistical measures of the degree of restrictiveness of a tariff are misleading because the proportion of dutiable imports to total imports is reduced step by step with the restriction of imports. As tariff rates become more restrictive, therefore, there results a lowering rather than an increase in the average ad valorem equivalent. This is most clearly seen if rates were raised to such levels as to prohibit the entry of all dutiable imports, because in such a case the average ad valorem equivalent would be zero. When, however, specific rates are being reduced while others remain unchanged, it is helpful, though not strictly accurate, to compare tariff levels in terms of average ad valorem equivalents.

#### Further Power to Reduce Duties

It will be recalled from the discussion in the immediately preceding pages that almost one half of the duty reductions effected under the trade-agreements program through 1944 were for the full 50 per cent authorized by law. Now, if you have exhausted your power to grant concessions on many tariff categories, you will have correspondingly reduced your bargaining power in tariff negotiations with foreign countries. This was the position in which the trade-agreements organization found itself during World War II. But the tradeagreements program had made only a beginning! It was necessary, therefore, to enlarge the tariff-reducing powers of the President if the program was to continue to make a much-needed contribution to the reduction of trade barriers. Accordingly, when Congress extended the Trade Agreements Act in 1945 for an additional three years, it also authorized the President to reduce duties up to 50 per cent of the level in effect on January 1, 1945. By means of this authority, it will be possible to effect duty reductions, in the case of those commodities in which a 50-per-cent cut had been effected up to January 1, 1945, equal to 75 per cent of the level in existence in 1934. If full use is made of this authority, it is estimated that the result will be a general tariff level comparable to that under the relatively low Underwood tariff of 1913.

# An Evaluation of the Commercial Policy of the United States

The main results of the trade-agreements program may be enumerated. First, many high protective duties have been reduced, although a number of duties will remain at a prohibitive level. Moreover, many duties will remain prohibitive of imports even if duties are cut to 50 per cent of the level of duties on January 1, 1945. Secondly, adherence to the unconditional MFN clause has tended to diminish discrimination in international trade. On the other hand, the subdivision of dutiable commodity classes—the reclassification problem has introduced discrimination at the same time that we have been insisting upon unconditional MFN treatment. In a number of instances, the interdepartmental committees of the trade-agreements organization, as a matter of expediency, have narrowed the scope of proposed concessions to foreign countries by redefining the commodity in such a way as to restrict the concession largely to one country. If, for example, worsted woolens of a given type come predominantly from country X. the concession may relate, not to worsted woolens as a broad class, but to the particular type coming from X. Other countries obtain on paper the very same duty reduction on this type of merchandise under the MFN provision. These countries, however, are relatively uninterested in the type in question because they have a comparative advantage only in a different but related type of product on which no concession, or a lesser one, is granted. In the third place, the trade-agreements program clearly has helped to increase international trade. The precise extent of such help is not determinable,

however, because it is not possible to isolate the effects of trade agreements from other factors simultaneously operating to affect the volume of trade.

The trade-agreements program has made only a beginning. Its scope should be broadened in several particulars. First, the present authority of the President to modify the American tariff only contractually—that is, only through international negotiation—should be revised to permit unilateral tariff reductions, subject for a time only to some lower limit, such as a minimum ad valorem equivalent of 15 to 20 per cent. By this means many prohibitory rates of duty could be eliminated. To be sure, there is no reason why prohibitory duties could not be reduced by the trade-agreements method of obtaining reciprocal concessions from other countries. But it would be helpful to have the power to effect cuts unilaterally. Even more desirable than unilateral reductions would be a policy of effecting sweeping duty reductions by means of a multilateral trade convention, as outlined in Chapter 23.3

Another step that should be taken is the repeal of Section 336 of the Tariff Act of 1930. As was indicated in an earlier chapter, this provision, the equalization-of-costs rule, leads logically to the total elimination of international trade. Since the trade-agreements program aims at the revival of international trade, the retention of Section 336, even though it has not been invoked in recent years, makes for an embarrassing inconsistency in our policy. Fourthly, the United States should put an end to the preferential treatment of Cuban imports. This preference, which is purely political in character, is but a legacy of the period when the United States held a semiprotectorate over our neighboring island republic.

<sup>\*</sup>It may be pointed out that bold proposals for a permanent International Trade Organization were advanced officially by the United States Government in 1945 and 1946. These proposals call for the establishment by the United Nations of such an Organization so that continuing attention may be devoted to ways and means of combatting barriers to trade arising from tariffs, quotas, exchange control, subsidies, and state trading. See Suggested Charter for an International Trade Organization of the United Nations, Department of State, Washington, D. C.. Sept. 1946.

In the fifth place, it is necessary to conduct a concerted drive against protection arising not out of specific decisions of Congress but out of the decisions of administrative officers, or what is known as administrative protection. Regulations are often employed for their nuisance value in excluding certain commodities. Arbitrary valuations may be placed on imported goods; costly customs formalities may be imposed. All such devices are protective in an indirect sense. Uncertainties are created which needlessly increase the cost of conducting trade, as witness the experience under the American regulations relating to marks of national origin. A shipment of cocoa originating in British Africa was held to be illegally marked because the French language was used. The cocoa was returned to Liverpool, England, in order to avoid a penalty of \$15,000.00. Finally, the United States should take a more consistent stand with regard to the question of export subsidies.

We object to subsidies when imports are involved, but favor them if they help our export trade. In the very year that the trade-agreements program was authorized, Congress also authorized export subsidies on wheat (Agricultural Adjustment Act of 1934). In 1944 the subsidy system was extended to . cotton exports, yet we have proceeded vigorously against subsidies paid by some foreign governments on dutiable merchandise entering the United States. Thus, countervailing duties were imposed on German goods in 1936 because export subsidies were deemed to have been involved in the financing of exports from blocked mark accounts. In early 1939, in part because of political reasons, the Treasury ordered that all dutiable merchandise of German origin should pay countervailing duties (Chapter 18). We have closed our eyes, however, to comparable practices on the part of several Latin American countries. Thus, Venezuela frankly pays an export subsidy on coffee and cocoa (both of which, however, are not dutiable in the United States), by way of specially favorable buying rates of exchange in the case of these two products. Washedcoffee exports were subsidized to the extent of 38 per cent up to 1942 by the simple procedure of buying coffee export drafts at the rate of 4.60 bolivares per dollar when most transactions were effected at the rate of 3.35 bolivares per dollar. This subsidy system is still in effect in Venezuela. Argentina and Chile have used similar methods since the early 1930's, with respect to goods which are dutiable and nondutiable in the United States. As regards our policy on subsidies, therefore, it may be charged that it is inconsistent with regard to imports and exports, and is also uneven in its application to different countries which make use of the subsidy technique. Moreover, our subsidization of exports makes us particularly vulnerable to criticism on the ground that export subsidies should not be employed by a creditor nation.

#### Summary

Throughout our history as a nation, we have made use of little other than the tariff in the commercial policy field. During our early history, the tariff was both a device for raising government revenue and an instrument for encouraging the growth of domestic manufacturing industries. Although the level of duties was rather high most of the time, there were frequent changes in tariff rates, reflecting mainly the government's changing need for revenue. As we matured economically, however, tariff changes occurred less and less for revenue reasons and more and more to aid domestic industry and agriculture

Throughout the early period and up to 1922, moreover, we were not much interested in problems of equality of treatment in international trade, as witness the fact that we were wedded to the MFN clause in its conditional form. We shifted to the unconditional form of MFN in 1922, and in the period since then, the United States has been universally recognized as a champion of nondiscrimination in trade. The unconditional

<sup>&</sup>lt;sup>4</sup>Funds to pay such subsidies were acquired by requiring the foreign-owned oil companies to obtain local currency at the rate of 3.09 bolivares per dollar.

MFN clause is the basic pillar of defense against discriminatory treatment, but other devices have also been employed. These include the imposition of penalty tariff duties, the withholding of low duties which are granted in reciprocal trade agreements. and the use of the representative-period formula in the case of nontariff discrimination. As far as concerns discrimination in its simple form, that is, tariff discrimination such as occurs in the operation of some systems of imperial preference, the United States has been partly successful in its fight for equality of treatment. Much less success, however, has attended efforts to combat discrimination when practiced by nations having complicated systems of exchange control or state trading. From the record, it would appear doubtful whether discriminatory treatment can be effectively eliminated as long as there are bilateral exchange-control arrangements and statetrading systems.

A more positive policy, and one which offers greater promise of liberalizing world trade, is that represented by the American trade-agreements program. We saw that this program, inaugurated in 1934, consists of the reduction of tariff and other trade barriers by bilateral agreement, with immediate generalization of reduced duties to other countries under the unconditional MFN clause. The agreements thus result in a kind of multilateral reduction of barriers to trade. Under the original act and its several extensions, the President was limited to duty reductions not exceeding 50 per cent of those specified in the Tariff Act of 1930 (that is, the duties in effect in 1934). As a step toward freer trade, an act of Congress in 1945 increased this power by authorizing the President to reduce duties up to 50 per cent of those in effect on January 1. 1945. At present, therefore, it is possible to cut duties to as low as 25 per cent of the 1930 level in those cases in which the full 50-per-cent reduction was effected prior to 1945.

The trade-agreements program has made a good start, but much work remains to be done. Some duties will still be prohibitive of imports even if tariff rates are cut to 75 per cent of the 1930 level. The President should be authorized to make unilateral reductions in duties whenever they are found to be at prohibitory levels. A second problem is that of tariff reclassification, which serves to defeat the purposes of unconditional MFN treatment. The United States should also eliminate its anachronistic system of tariff preferences, which extend to but a single country, Cuba. In the fourth place, administrative protectionism should be vigorously attacked. Finally, we should take a more consistent stand on the question of subsidies. We should not attack other countries for subsidizing exports and at the same time carry out a similar program of our own.

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# PART IV MONETARY A D FINANCIAL POLICY

#### Chapter 27

# Leading Policy Problems

#### Commercial Policy and Monetary-Financial Policy

A country's international monetary policy is not separate and distinct from its commercial policy. All policies in the international economic field are closely interrelated, and this interrelationship is nowhere more clearly indicated than in the case of the link between commercial and monetary policy. In fact, the kinship is so close that confusion and misplaced emphasis are bound to result if the student fails to keep constantly in mind that many of the observable man-made effects in international economics are the joint result of commercial and financial policy. In this book, the policy phenomena of international economics are grouped under the separate headings of commercial and monetary policy only for reasons of convenience of analysis. (Monetary policy in this chapter will be taken to mean monetary and financial policy.)

A convenient way to illustrate the interrelations between a country's monetary policy and its commercial policy is to use the framework of the balance of payments. Offhand, it would appear that a country's commercial policy would have effects only upon the current account of its balance of payments, whereas a country's monetary policy would have repercussions only upon the capital account. But let us consider some typical commercial-policy devices, such as tariffs, import quotas, or protective exchange control. These devices clearly work directly upon the country's volume of commodity trade, the largest single component of a nation's balance of payments. Other things equal, an increase in the protective effect of any

one of the aforementioned co ercial-policy devices widens the export trade balance, at least in the short run. The current-account position is thus strengthened. A previous current-account deficit may be wiped out or a surplus may be shown. But bearing in mind what was said in the chapter on balance-of-payments analysis, it is clear that there can be no change in the character of the balance of payments on current account without a related shift in the country's position on capital account. Under the conditions being considered, the initial impact would be on the country's short-term capital account. (Had the opening move been an increase in longterm lending instead of an intensification of protective commercial policy, the tie-up would obviously have been between the current account and the long-term capital account.) We thus see that a change in commercial policy has an impact effect on the position of the capital account as well as on the position of the current account. But the capital account is clearly the financial sector of a country's international operations. It follows therefore, that commercial and monetary policy are both affected by what at first glance appear to be one-sided factors.

But if the capital account is affected by changes in commercial policy, there will also be a simultaneous effect upon the foreign-exchange market. In other words, there will be a change in the prices at which foreign currencies can be purchased in uncontrolled exchange markets, or, given unchanged exchange rates in controlled markets, there will be a change in the availability of such foreign currencies. We see, therefore, that changes in commercial policy have important effects of a monetary sort. The gears of commercial policy mesh inevitably with those which are labeled monetary policy.

# Monetary Policy Defined

We are now in a position to define what is meant by monetary and financial policy. (A nation's monetary policy comprises that part of national policy having to do with (1) the

level of its exchange rate and the degree of convertibility of its currency into foreign currencies, (2) the extent of its cooperation with other nations on monetary and investment problems through formal international organizations, (3) the terms and conditions under which it buys and sells gold internationally, and (4) government foreign-loan policy and the inducements to or the restraints placed upon private foreign investment. For the present, little more need be said about this definition, since its component parts are considered systematically in the remaining chapters of this book. It is appropriate to add a word, however, about elements which have been deliberately excluded from the scope of our definition of monetary policy.

We exclude two things which might appear to be involved. First. the content of monetary policy does not include the area of multiple-exchange rates. Exchange rates other than the basic rate are excluded because, as we saw in an earlier chapter, the spread between buying and selling exchange rates in the case of multiple-exchange-rate countries constitutes at bottom either the equivalent of an export tax or an import bounty. But export taxes and bounties on imports are properly matters of commercial policy, and so have no place in the chapters which follow. To be sure, the standard case of under- or overvaluation of the currency involves repercussions of a commercial-policy sort. Thus, it is well known, as has been emphasized in previous chapters, that an undervalued currency operates as a spur to exports, whereas an overvalued monetary unit is the equivalent of a uniform increase in the cost of imports, and so is not unlike the tariff as far as its effects are concerned. These effects, however, only indicate the interrelations between commercial and monetary policy. The important point is that in the case of a single exchangerate country, the over- or undervaluation of its currency produces commercial-policy effects only incidentally, whereas such effects are sought after as a matter of design in the case of countries engaging in multiple-currency practices.

The second exclusion from our definition of monetary policy should probably be only a footnote to the chapter on gold policy. In this book, gold is not meant to be used as a synonym for the monetary metals in the traditional sense (gold and silver). There are no longer monetary metals apart from the physical ingredients of coins. Gold is now the only monetary metal, and its role seems to be steadily declining in importance, as will be indicated subsequently. It is for these reasons that the special problems relating to silver are not discussed in this book. Silver is no longer anything but another mineral product to which a few countries, but mainly the United States, for reasons of mere internal politics, choose to accord a greatly inflated value as well as separate statistical treatment for balance-of-payments purposes.

# Typical Policy Alternatives

Among the policy alternatives open to most nations, and particularly the larger ones, there are, strictly speaking, any number of types and combinations of types which can be adopted. As a rule, policies are not adopted in anything like their pure form. Variations from type are general, particular differences being traceable to the varied character of the national interests which the policies are intended to serve. For purposes of simplicity and emphasis, however, we shall consider in broad outline a few of the leading policy alternatives in something like their pure form.

## Stable domestic prices or stable exchange rates

Nations having free or relatively free institutions cannot simultaneously enjoy, under conventional monetary arrangements, both stable domestic prices and stable prices for imported commodities and services. A choice must be made between these two goals. This point may be illustrated by considering the case of a country that chooses to keep its domestic prices stable. The country would soon learn that prices and demands within its borders do not necessarily remain in line with foreign prices and demands. Thus, a policy

stressing domestic price stability may result in the maintenance of a domestic price level considerably above the level of foreign prices for identical or comparable goods and servi-The result will be an inevitable tendency for residents to shift purchases to foreign sources of supply, whereas foreigners shift their purchases from residents to other countries. There is bound to be disequilibrium in the balance of payments followed by an increase in the price of foreign currencies. unchanged foreign commodity prices, a higher price for foreign currencies will result in an increase in the price level of imports. Substantially the reverse would be true if the circumstances were just the opposite of those assumed above. is a general statement of the problem; a more complicated and realistic presentation would take account of different price and income elasticities of demand in the several countries. the problem, in its basic aspects, would be substantially as stated above.

The conclusion to be drawn from the foregoing brief discussion is as follows: (A country must be prepared to accept a fluctuating exchange rate if it pursues a policy of domestic price stability, but it must be prepared to face fluctuating internal prices if it wishes to maintain exchange-rate stability.) The latter alternative, it might be added, characterizes the traditional international gold standard, which is discussed in the succeeding chapter.

## Undervaluation or overvaluation of the currency

A monetary policy which is sometimes employed to effectuate a commercial-policy or a joint commercial-financial-policy objective is that involving the under- or overvaluation of the national currency. Under- or overvaluation naturally suggests departures from some norm or standard; for present purposes, however, we need not concern ourselves with such a norm. We shall instead define our terms to serve working purposes. (Undervaluation of the exchange rate may thus be defined to mean a level of the exchange rate such that, given the condition of the balance of payments, exports of goods and

services are larger than their equilibrium volume. Such a price for the country's currency is too low (undervalued) because, speaking elliptically, it serves to create a volume of demand which more than clears the market. In other words, this price or exchange rate unduly encourages exports, and conversely, unduly discourages imports. An overvalued exchange rate produces just the opposite set of results: it overstimulates imports and unduly discourages exports from the country in question.)

Sometimes nations deliberately choose one course or the other, knowing, or having a reasonable basis for expecting, that the results as stated in the preceding paragraph are almost certain to occur. In many other cases, however, countries just drift into an exchange-rate policy which involves either underor overvaluation of the currency. In most cases, retaliation by other countries is generally not long delayed, since customary international trade channels may be seriously disturbed by an aggressive exchange-rate policy (undervaluation of the currency). Clearly, little or no trade advantage is gained if the retaliation, let us say in the form of offsetting tariff duties, is swift and adequate. The over-all result is simply a decline in trade and a worsening of the terms of trade of the country that attempted to carry out a policy of undervaluation.

### Extent of control over capital movements

Countries may impose no restrictions over international capital movements, or they may control such movements in varying degree. The nature of the problem will vary from country to country, depending upon the condition of the balance of payments, the development of free institutions, the financial history of the country, its capacity to expand exports or to contract imports, and so on.

Until recent decades, the international movement of funds was permitted to go on without restriction by national states. The situation changed radically after World War I, and especially during the world-wide depression of the 1930's. Control

finally became complete and universal during World War II, when all states either prohibited the export of funds or permitted capital movements only under license. Moreover, by international agreement (reached during the International Monetary and Financial Conference at Bretton Woods, New Hampshire, in 1944), the nations of the world have given their consent to the proposition that each country has the right to subject capital movements to some form of national control.)

The question which remains, however, is "What type of control?" If past experience is any guide, it appears that the type and degree of control will vary considerably. (Control is likely to be very strict in countries in which the domestic economy is largely or completely controlled according to a central plan.) Severe restrictions are also likely to be imposed on capital movements if countries in which the domestic economy is substantially free are suffering from severe balance-of-payments difficulties. (Restrictions may also be imposed by a country pursuing a policy of extensive pump priming to combat depression.) Countries such as the United States, on the other hand, are not likely to be faced in the near future with a condition of the balance of payments which will require the imposition of controls over capital movements.

It is unlikely that all types of international capital movements will be subject to the same degree of control. Those movements which are most disturbing to the national economy will in all probability be most severely controlled. The prewar movements of so-called hot money come readily to mind. These movements of capital are what were described as autonomous short-term capital movements in Chapter 8. That is, they involve movements of funds that are unrelated to the condition of the balance of payments, and in their worst form represent the export of funds at the very time that short-term capital imports are required. Countries such as Great Britain, having a great creditor tradition but being faced also with an acute balance-of-payments problem at least during the early postwar period, are likely to rely heavily on the control

of autonomous capital movements. Equalizing short-term movements, however, should receive favorable treatment in the British case. But long-term capital will probably be closely controlled, mainly (1) to insure that it is within the country's means as disclosed by its balance-of-payments prospects and (2) to integrate monetary policy with broad political policy.

## Exchange control versus depreciation

Apart from the use of exchange restrictions to control capital movements, countries are sometimes faced with the problem of choosing between the imposition (or strengthening) of exchange control or depreciating their currencies. (A choice will have to be made basically because the country is confronted with an unfavorable balance of payments.) It is losing. let us say, gold and foreign-exchange reserves at a faster rate than appears desirable. The orthodox procedure, except under strictly gold-standard conditions, would be to allow the national currency to depreciate in the foreign-exchange market. A reduction in the value of its currency would make imports dearer and tend to encourage exports; the dearer imports would both cut down the volume of purchases from foreigners and offer additional protection to domestic industry, whereas the encouragement of exports, coupled with the change in imports. would hasten the restoration of something like equilibrium in the balance of payments. The terms of trade, however, would definitely shift against the country in question. But some countries may prefer a worsening of the terms of trade to the use of direct restrictions on trade and payments which greatly disturb the channels of trade and often result in discriminatory treatment.

(The basic question, however, is whether currency depreciation will be effective in restoring something like equilibrium in the balance of payments. Much depends on the structure of the country's foreign trade, the state of world markets, and the country's internal economic condition.) There are many cases of recent record in which countries, especially the smaller ones such as Chile, have been faced with a combination of three

things: (1) a concentration of exports in two or three commodities, (2) sizable world surpluses in these commodities, and (3) pronounced internal inflation in the form of a rapidly increasing volume of means of payment. In such circumstances, currency depreciation is likely to be ineffective in restoring equilibrium in the balance of payments. Specifically, it is unlikely that depreciation will result in an appreciable decline in the volume (and gold value) of imports or a measurable increase in the volume (and gold value) of exports. Moreover, the value of the currency is not likely to settle at its natural level when such circumstances prevail. In brief, depreciation may not constitute a workable alternative to some form of temporary exchange control.

A system of flexible exchange control, imposed as a purely temporary device and subject to internationally acceptable methods of operation, is likely to be a superior mode of handling the situation.) Such a system of control would permit the attainment of predominantly monetary goals, as, for example, the maintenance of the external value of the currency, the nondissipation of gold and/or foreign-exchange reserves, and the control of capital movements. Some protective effects could hardly be avoided, however, owing to the interrelations between commercial policy and monetary policy. Thus, exchange-control restrictions on, let us say, imports of luxuries would increase the protection afforded domestic industries in those lines. Such increase in protection, moreover, would be greater than under a policy of depreciation, since currency depreciation operates to produce a more nearly uniform increase in protection throughout the range of industry. But under the not uncommon circumstances referred to in the preceding paragraph, it is clear that a policy of temporary exchange control suffers from fewer disadvantages than the alternative of exchange depreciation.

International policies and domestic employment

Perhaps the dominant consideration in the shaping of monetary and financial policy will be the problem of maintaining home employment at a high level. The issue involved is

that of internal versus external stability. Until a few decades ago, it was generally assumed that internal and external stability were equivalent, and that the way to assure all-around stability was to maintain a balanced federal budget. The consensus was that a balanced budget would assure domestic stability, which would in turn provide the basis for external stability. So went the theory. (Actually, there is no foundation for the presumption that a balanced domestic economy implies balance in the country's international accounts. Disequilibrium in the balance of payments may coexist with an essentially balanced internal economy, and it would be possible to have a condition of equilibrium in the balance of payments when underemployment and an unbalanced budget characterized the domestic situation.)

The old view that domestic and external stability were one and the same really meant that a country's domestic economic policies were dictated by economic forces from abroad, forces over which the country had little or no control. This generalization is not strictly descriptive of countries of continental proportions and of relatively great economic independence, such as the United States: but the generalization is substantially accurate as concerns most other nations. It is true that during long periods of widespread, and sometimes spectacular, secular world-wide economic expansion, such as characterized the world subsequent to about 1780, countries are less likely to be troubled by the close tie-up between domestic and external stability. For almost two centuries the economic world has been expanding geographically, expanding in population, and expanding in capital equipment. Adjustment within a given national economy is greatly facilitated when there is expansion in the economic universe as a whole. day, however, although basic economic circumstances remain unchanged in their essentials, national dependence on broad international development has changed in material respects. The United States, for example, dependent on foreign supplies for much of its early development, no longer exhibits such

dependence. Indeed, the relationship is reversed. Moreover, the emphasis has shifted from development to stability, or stated more accurately, from development itself to development with stability.

In other words, for some of the economically most important nations, the pendulum has swung the other way. ) Some of the economically strong nations no longer desire to adhere to a rigid international system that ties their hands when forceful domestic action is required to maintain employment. (If necessary, nations will adopt special arrangements, such as restricted currency blocs and preferential trading areas, to insulate themselves economically from the rest of the world.) But economic insulation may well lead to dangerous political isolation. What is required is a sound forward-looking view. in which considerations of national and international welfare predominate in shaping policy. From now on it is reasonably certain that nations will insist that they be free to alter internal arrangements in order that they may maintain stability at home. It follows, therefore, that the proponents of the demonstrably superior multilateral trading system must face the fact that monetary and other mechanisms will have to be devised which will assure nations that they can reap the advantages of multilateral trading without endangering their domestic welfare.

The choice, however, is not between domestic stability and world stability based on international specialization in production. It is not so much a question of choosing between alternatives as it is a problem of balancing short- and long-run objectives in the interest of maximum welfare all round.) Nations that undertake to pursue domestic economic policies designed to assure high-level employment and income must not forget that their own citizens, as well as the smaller nations which cannot pursue independent expansionist policies because of their small size, are best served in the long run by policies that seek to make the best use of world resources. Comestic employment policies, therefore, must be supplemented by

### Chapter 28

# The International Gold Standard

URING several centuries, gold has been the international money par excellence, and for many decades prior to 1914, the leading commercial nations of the western world adhered to what was known as the gold standard. As the reader will recall from an earlier chapter, this standard is one in which the national monetary unit, or standard, is defined in terms of so many ounces of pure gold, the unit being freely offered in redemption of national paper money and the metal being freely exportable from and importable into the nation. For a time, the gold standard served the world well. However, the old order has been changing so that the status of gold in international affairs is now more complicated than before, and the proper place of gold in monetary affairs is still the subject of vehement controversy. We have included the present chapter in the hope that it will remove some of the confusion which usually surrounds the public's discussion of gold.

### The Rise of Gold

The early civilizations which developed around the Mediterranean used a variety of metals as money. This was a natural development. Money is essential to economic progress, for by facilitating exchange of goods, it makes possible productive specialization and enhanced consumption. The use of metals for money was also inevitable. Metals were valuable, not only because of their then intrinsic worth, but because they were so hard to procure that their continued value seemed assured. On account of their durability, a person could invest his wealth

in them. Gold and silver were also highly portable. Precious stones were the only other goods which might have been used as money. However, gems were unduly scarce (which hindered general circulation) and lacked standardization (with the result that the value of a particular gem was too uncertain). So it was that, by the time of the Roman Empire, the principal forms of money were gold, silver, and copper. This situation continued through the Middle Ages, except for a tendency to emphasize gold owing to its greater value in terms of weight and bulk.

By the end of the sixteenth century, coinage of the three monetary metals was firmly established in Western Europe. Standardization was furthered by the use of milling around the coin's edge to prevent clipping. Under these circumstances, foreign exchange was largely a physical and metallurgical problem. A merchant who wished to make an international transfer of money had only to carry gold coins out of one country and present them at the official mint of some other nation. Here they would be melted down into bullion and refashioned after the likeness of some other regal profile. Probably a majority of international transfers were effected in this manner inasmuch as organized exchange hardly existed save in the most rudimentary form.

An exclusively metallic money possessed the inherent disadvantage of being very accidental in supply. Admittedly, an individual country might vary its holdings of bullion somewhat by more or less exertions in the field of foreign trade; but the Western World, for many centuries before Columbus, had an almost fixed and unvarying stock of monetary metals. Only a thin trickle came in across Asia Minor from the Indies, and against this trickle was the inevitable wastage of everyday use. Thus it was that the new geographic discoveries had violent financial repercussions because the silver and gold of the New World, largely controlled at the source by Spain, flooded out over Europe and inflated prices everywhere.

This development was witnessed by several keen observers,

and it hastened enunciation of the quantity theory of money. namely, that a country's price level varies directly and proportionately with the quantity and velocity of circulation of money. Other observers had already commented on the connection between price-level disparities and bullion movements among nations. Hence, it was not long before early political economists, such as David Hume, were describing the specie-flow mechanism which was later to become one of the main theoretical supports of the gold standard.

The gold and silver hoards of South and Central America were soon looted by the Europeans, and the mining recoveries proved slimmer than had first been prophesied. For three hundred years, until the California and Australian gold strikes of the middle nineteenth century, the vigorously expanding economies of the Western World were handicapped by a money shortage. Population and economic output rose by leaps and bounds, but the gold supply tended to remain almost unchanged. A financial famine set in, and deflationary pressures were always in operation. It is not surprising, then, that paper money and other forms of negotiable instruments came to be developed despite some legal difficulties, and were hailed as a wondrous invention by Adam Smith and many others.

Initially, paper money, as contrasted with personal obligations such as commercial bills of exchange, was issued by banks and was essentially a gold certificate with full backing. (This had its origins in the still earlier practice of gold- and silversmiths safeguarding their client's bullion and specie and giving them receipts for the same.) Bankers quickly came to realize that there would be greater profits for themselves if they could issue more bank notes than they had gold to back them. Normally this was fairly safe because the bankers could count on the improbability of all holders of their notes presenting them for collection on the same day. A gold reserve far below 100 per cent of the outstanding note issue became the rule. Thus the bank note, which began as a receipt, became a means of expanding the money supply. The final stage in this evolu-

tion came later when people commenced making payment by check rather than by bank notes.

This evolution was always accompanied by some government regulation. In most countries, the establishment of a bank, with the power to issue notes, remained a privilege to be bestowed by the state rather than a right to be exercised by any citizen. Governments, when granting franchises, usually imposed conditions designed to protect note holders and depositors. The severity of such regulation naturally varied from country to country. However, although the details of this regulation differed, the general principles were almost everywhere the same. In most cases, the total note issue plus deposits had to be backed in full by various types of collateral of which a minimum percentage had to be in gold or money issued by the government. This money was tantamount to gold because the governments of all important countries stood ready to redeem their own money in gold. Hence, the money systems of most nations resembled an inverted pyramid, the top layer being the notes and deposits of commercial banks. the second tier being government money, and the base being gold.

By 1914 most countries held only fractional gold reserves against bank deposits and notes. The actual percentage varied from nation to nation depending upon the skill of its bankers and the financial sophistication of its citizens. For example, the Federal Reserve Act of the United States permitted average gold reserves as low as four per cent. This was a far cry from three centuries earlier when most of the money circulating in European countries consisted of coins. Evolution of money meant that gold movements eventually took the form of a bullion rather than of a specie flow. In earlier times a withdrawal of specie (coins) and a reduction in the money supply (coins) were one and the same event. The vital question, answered only after World War I and to which we address ourselves later in this chapter, was whether bullion

movements would exercise the same influence as specie flows on domestic price levels.

# Rules of the "Gold-Standard Game"

The gold standard, especially in the evolutionary stage attained during the several decades prior to World War I, was known as the automatic gold standard. It was automatic in the sense that there was not supposed to be any conscious national management of the standard. There was to be no effort on the part of individual nations on gold to depart from the accepted rules of the gold-standard game in order to force the price level to follow the particular direction or pace of movement desired by an individual country. The world relied upon the universal acceptance of the rules of the game to assure that the gold standard would operate as a truly international monetary standard.

What are the rules of the gold-standard game? Briefly, individual countries losing gold should contract the size of their monetary stock, but those gaining the yellow metal should expand their monetary stock. That is, individual nations on the gold standard are required to practice national inflation or deflation from time to time. (The one point that can be nailed down definitely is that nations on the gold standard are not supposed to avoid temporary embarrassment by the simple expedient of altering the gold content of their monetary unit.) Paradoxically, temporary national inflation or deflation is entirely consistent with the avoidance of inflation or deflation for the world as a whole over long periods. This is because the mechanism of adjustment operated through relative national price changes, as was shown earlier in Chapter 11. Nations whose monetary expansion outstripped their own gold supply were required, under the rules of the game, to correct the situation.

By what means were countries able to expand unduly? The answer is contained in the statement: Because of independent

national management. If countries losing gold did not wish to face the consequences—that is, allow their money supply and price level to fall—they fixed the situation by introducing some device to prevent the undesired results. As a rule, the situation was fixed by artificially raising or lowering the central-bank discount rate in order to induce offsetting movements of liquid funds, or to sterilize such funds. In other words, if the country were losing gold, it might raise its official discount rate in order to attract foreign funds to its market and so offset, at least in part, the effects of the initial loss of gold. This method often enabled countries in temporary difficulties to weather the storm, thereby gaining a breathing spell during which balanced relations might again be restored. About as often, however, the method was simply used to postpone the introduction of a process of adjustment that was inevitable in any case.

The <u>automaticity</u> of the gold standard, considered in and of itself, was a desirable thing. Business men and traders could be assured that the gold standard would permit foreign-exchange policy to conform to a definite pattern. This pattern consisted essentially of two things: stability of exchange rates within a narrow range (the gold points) and freedom in carrying out exchange transactions. Stability and freedom were regarded as the fruits of the gold standard, automatically operating in the general interest. With exchange stability and freedom, it was assumed that there would be a high level of international trade and investment.

It should be borne in mind that during the nineteenth century most countries of the world adopted the gold standard freely and as a matter of preference. During that period unemployment, instead of being regarded as a general problem, was looked upon as a temporary aberration confined to limited sectors of the economy. The nations were aware that exchange stability and freedom to undertake transactions in the exchange market could be enjoyed on an automatic basis only if important segments of the economy became adjusted to

changes in the country's international economic position. Official and unofficial reports regularly stressed the need for, and the desirability of, basic adjustment. Responsible groups were prepared to recognize in principle, at least, that exchange-rate stability and freedom to undertake exchange transactions required changes in the domestic economy to correct maladjustments in its international accounts. It was the accepted view that these necessary changes would be made even in the face of severe pressure from groups adversely affected. Such, in brief, was the prevailing attitude without which it would not be possible to speak of an automatic gold standard.

In practice, however, it was not adequately appreciated that the gold-standard features of exchange stability and exchange freedom could be realized, and a high level of international trade and investment attained, only if there were sufficient flexibility in the economies of the principal countries. With a flexible system, an unfavorable balance-of-payments position (deficit) could be rectified by means of falling prices and falling money incomes without causing mass unemployment in the country in question, while other favorable-balance (surplus) countries experienced the appropriate volume of credit expan-However, in the absence of flexibility, the deficit country can only repair its position by undergoing large-scale unemployment and a falling price level. Unemployment is able to spread from one country to another through the channels of international trade. It was not adequately appreciated during the heyday of the gold standard that important inflexibilities (for instance, rigid wages, price fixing, factor immobility, and so on) in major national economies would prevent the maintenance of exchange stability and exchange freedom unless each such economy succeeded, by various purely domestic measures, in maintaining a high level of national income.

There is an even more basic criticism of the operational features of the gold standard. Under conditions of less than complete flexibility in each national economy, the gold standard suffers from excessive brittleness, cracking or nearly cracking whenever there is a general passion for liquidity. Since gold, or instruments attached to and convertible into gold, alone possess unlimited liquidity, the economy periodically subordinates production and import to the attainment by the public of a high measure of liquidity. What is worse, the attempt to provide for liquidity hastens the need for it and simultaneously increases the area of depressed business because savings and hoarding increase relative to investment outlay. That is to say, business men become liquid by disinvesting inventory and other commodity holdings, and by reducing the scale of their employment operations. Such disinvestment and reduced employment in turn depress prices and dampen enthusiasm for enterprise, which places a premium on even greater liquidity, and so on.

#### The Gold Standard Between the Two World Wars

An idealized version of how a gold standard is supposed to operate has already been described. Practice in the main conformed with theory before World War I. Since 1914, however, gold has failed to exercise the regulatory functions it once possessed. During the last three decades, it has simply not been true that the monetary supply of the leading nations expanded and contracted automatically by some constant multiple of the gold stock within the country. Especially is this no longer true of the expansion process. The final outcome has been destruction of the gold-flow mechanism.

The phenomenon of gold sterilization occurred ever more frequently during the 1920's and 1930's. Gold imports were not always used to expand bank deposits, but instead were merely stored away outside the monetary system. This could happen in several ways. Many of the foreign central banks which sent gold to the United States did not sell it to the Federal Reserve Bank of New York, but deposited (earmarked) it there for safekeeping until such time as it might be needed to purchase dollar exchange. In this way foreign central banks could reduce the delays and expense of frequent shipment.

This earmarked gold was in most cases lost to the monetary systems of all countries. The banking regulations of a majority of countries prevented their central banks from counting gold held abroad as part of their reserves, a prohibition that was later rescinded in some instances. And the United States banking system did not-receive earmarked gold despite its physical presence in the country.

The period between the wars was also one of "hot money" movements, and was characterized by heavy and alternating withdrawals of funds from one nation after another as the nation approached or was expected to approach the day of currency depreciation. There would be a flight from the franc followed by a flight from the pound, and so on. These withdrawals were in the form of gold. The countries receiving the gold usually feared it would be suddenly repatriated. Hence, a majority of central banks, threatened with this prospect, maintained large emergency gold reserves against these expected drains. The establishment of these special reserves prevented full expansion. It was as if the banking system had swallowed the gold imports but had failed to digest them.

Especially during the depths of the depression, national banking systems frequently could not expand the total of bank deposits even though adequate gold and other legal reserves existed. Most bank deposits are the result of bank loans. Governments cannot compel banks to make loans or force business men to ask for them. Nor is the getting of a bank loan an automatic process. In times of economic depression, the caution of bankers and the pessimism of entrepreneurs combine to prevent credit expansion. Gold imports will tend to be inflationary only if business conditions are propitious.

Frequently, gold withdrawals from a gold-standard nation are self-accelerating. At the outset there may be a loss of gold because of an import trade balance. Should this be long continued, fears and rumors of currency depreciation will arise. Persons who hold balances in this particular money will begin to withdraw their wealth in an attempt to convert it into a

safer currency. Thus, a small outflow of gold on trading account may be swelled to panic proportions. This progress of events is wholly analogous to a run on a bank. A little weakness engenders a destructive exodus of funds. In the end, the nation must often "close its doors" by either refusing gold redemption, placing an embargo on gold exports, or paying off at a reduced rate in gold. In other words, the traditional adjustment mechanism either does not work or operates too slowly.

Theoretically, the original gold movement on trading account should induce price level adjustments and thereby reverse the flow of bullion. However, experience has proved that a central bank that did nothing but wait for nature to take its course would end up with no gold reserves and few prospects of regaining them. If the nation wishes to remain on gold, the usual remedy is to reduce the gold content drastically and immediately. Definitive action of this kind is likely to calm the fears that initiated the gold drain. Not only may it arrest the outflow, but it may also, by making investors and speculators believe the danger is past, bring about a repatriation of gold. The basic difficulty with the once-and-for-all cut in gold content is that it is almost impossible to know in advance precisely how large a cut in gold content is required. On the other hand, a series of small devaluations, a gradual crumbling of the currency, is likely to aggravate the situation. Central banks have learned from experience not to wait for gold movements to reverse themselves automatically.

Between the wars, many governments desired their central banks to control the business cycle. For example, the Board of Governors of the Federal Reserve system use the controls at their disposal to prevent credit expansions that threaten a boom, and credit contractions that appear too deflationary. Admittedly, these efforts have not always been effective, and this entire approach is still largely experimental. However, to the extent that it does succeed, it works at cross purposes

with the supposedly automatic and inevitable operations of the gold-flow mechanism.

# United States Gold Policy

The international importance of gold cannot be discussed without considering the policies of the United States Government because about two thirds of the world's supply of gold bullion is now in this country and because most of the newly mined gold is sold to the United States Treasury. Another way of putting it would be to say that the people of the United States have purchased too much gold to be indifferent about its future.

The Roosevelt Administration came into office in March of 1933. Almost its first act that was taken in connection with the bank moratorium was to restrict the hoarding and exporting of gold and thereby take the United States off a full gold standard. This particular measure was probably unnecessary because the real problem was to restore the people's confidence in the banks rather than in their government's money. In June, the President signed a Congressional Resolution which abrogated the gold clause in existing governmental and private obligations, and declared all currencies and coins of the United States to be legal tender.

One of the principal objectives the Administration set for itself during the first hundred days of its tenure was the restoration of commodity prices. This goal was artfully described as reflation. Accordingly, the President asked and secured a variety of inflationary powers from Congress. One of these was authority to reduce the gold content of the dollar up to 50 per cent. However, before using this particular power, he experimented indirectly with devaluation by advancing the price paid by the government for gold:

The Administration's gold purchase plan, which commenced in October of 1933 and in one form or another outlived President Roosevelt, has been one of the most amazing episodes in

recent monetary history. This program was urged upon the President by a number of agricultural economists headed by Professor George Warren of Cornell. This group apparently ignored or denied the quantity theory of money and the monetary equation. Instead they adopted the thesis that any desired price level could be secured by varying the gold content of the dollar, a conclusion that seems to have been based on the very naive belief that the value relationships of different goods to gold are fairly inflexible, so that if the worth of gold rises in terms of money, the worth of other goods in terms of money must rise also. Professor Warren and his followers had little trouble in persuading the President that a deliberate lowering of the gold content of the dollar would not increase the general value of gold against all goods as much as it would decrease the value of the dollar in terms of all goods, and so beget a rise in prices.

This is analogous to suggesting that a projectile shoots the gun. Unfortunately, although it may be true in monetary mechanics that action and reaction are equal and opposite, the recoil will be insignificant if the body which reacts has a mass many thousand times greater than the recoil. The inertia of a few thousand or million prices quoted in dollars proved too much, and so it was that the value of the dollar, as reflected in wholesale price indices, changed hardly at all, but the value of gold increased by the amount of the premium paid by the United States Government. All this should not have been surprising, and in fact was what a number of experts predicted from the beginning.

The Administration did not permit itself to be daunted by events while it was armed with such a delightfully facile theory. Accordingly, between October 25 of 1933 and January 16 of 1934, the Reconstruction Finance Corporation progressively increased its price for newly mined gold, both domestic and foreign, up to \$34.45 per fine ounce. Finally, on January 31, 1934, the President, exercising powers previously granted him, reduced the gold content of the dollar from 23.22 to 13.71

grains of fine gold. This amounted to a devaluation of almost 41 per cent, and in effect set the price of gold at \$35.00 an ounce. This price has not been subsequently changed, and the Administration has indirectly served notice that it intends to continue this price indefinitely.

It has already been shown that this remarkable policy of increasing the dollar price of gold was not motivated by a desire to *improve* our balance of payments, but rather to increase domestic commodity prices. And in 1933, achievement of this isolationist aim was considered more important than the success of the World Economic Conference. By this criterion, the gold-purchase policy of the United States must be adjudged a failure because all subsequent increases in the price level occurred much later and from other causes. This program has been a godsend, however, to foreign countries that mine gold. Their gold production is in almost all cases sold to the United States Government because the ratio of the gold price to commodity prices is higher in the United States than in almost any other country, and this result is striking evidence that the Warren plan operated in reverse.

The Union of South Africa has probably benefited most from the gold policies of the United States. This is nicely illustrated by the balance of payments of South Africa in a typical year, as is shown in Table 35.

TABLE 35

BALANCE OF PAYMENTS OF THE Union of South Africa in 1936\*
(in thousands of South African pounds)

N.	et credits	NET DEBITS
Merchandise Interest and dividends Other services. Long-term capital. Errors and omissions. Gold.	14,716	21,820 5,727
	97,420	97,420

Source: League of Nations, Balances of Payments 1938, p. 123 Geneva, 1939.

In other words the people of the Union of South Africa were able to live on imports of greater value than they exported (excluding gold), enjoy more services from others than they provided in return, and to service and repay debts previously contracted from abroad—all in exchange for exported gold. Most of this gold is eventually bought by the people of the United States through their government. The economic folly of digging up this gold in South Africa, and then returning it to the ground at Fort Knox, was forcibly demonstrated during World War II, when materials and man power were mining unwanted gold instead of producing for the war effort.

The extensive gold purchases made by the United States do not represent the kind of shrewd bargain which the traditional Yankee is always supposed to drive. When Americans buy gold from abroad, they give foreigners dollar credits which become claims on our goods and services. In real terms, the American economy gives foreigners machines and farm produce in exchange for gold. This would not matter if we could use the gold or if producing things did not exact effort and cost. But the contrary is actually the case.

At present the United States is more off than on a gold-bullion standard. It is true that the government does buy and sell gold; however, the dollar price offered and asked by the Treasury can be varied over a wide range. Moreover, the government is no longer duty bound to sell gold whenever someone has dollars they wish redeemed. Instead, gold sales are at the discretion of the Secretary of the Treasury, who, in addition, has the power to prescribe how it shall be used or whether it shall be exported. (The present Treasury policy is to permit foreign central banks to purchase and export gold.) Private persons can possess gold only under license or general dispensation of the Treasury. This is a far cry from a real gold-bullion standard because its essential characteristics are all clearly lacking.

### The Future of Gold

(The importance of gold seems to wax as the prevalency of the gold standard wanes.) There is not a government in the world that will not sell its currency for gold, but there are very few that will do the opposite. There is no country in the world that prohibits gold imports, but there is hardly one that will permit the export of gold except under special license. However, this is no real contradiction. Gold is prized most highly in those countries that have the least of it; and naturally, it is precisely these same countries that have had to abandon the gold standard. Scarcity, which implies a basically unhealthy balance of payments, is the explanation of both phenomena.

This lack of gold as a reserve has compelled a movement towards a completely managed currency which is wholly inconvertible and controlled in supply. Private possession of gold is then illegal except under license. Whatever gold remains in the country is held by the government to be used to settle international balances when necessary.

Before World War II, some central-bank officials claimed that the usefulness of gold in international payments depended upon its even distribution among the nations. (It was suggested that if most of the world's gold became piled up in a few countries the have-not nations would be compelled to agree upon some other international money in order that they might continue to trade with one another.) The analogy of a group of boys playing marbles was cited by the head of the German Reichsbank, who pointed out that when one boy captures all the marbles the game stops unless he gives up some of his winnings in order that the other players can continue. This was a veiled hint to the nations with accumulated gold holdings that one day they might discover this metal had lost its artificial monetary value.

(It is quite true that if a majority of the nations could dispense with gold, and therefore no longer sought it through high prices or accepted it in payment, the present value of gold would fall. If gold had no monetary significance, its value would then depend on its usefulness in industry or dentistry and for jewelry or ornaments. Most governments, however, cannot dispense with gold entirely for the simple reason that there may be an unfavorable balance of payments requiring settlement in gold. This must be paid or financed with loans if gold is not forthcoming. In either case, the seller or lender wants the security of money or claims that will not depreciate in value. Will the Italians accept Greek obligations in drachmae and will the Greeks accept Italian obligations in lire? What is the danger of subsequent depreciation?

(The external value of an irredeemable paper currency is, in the final analysis, based on belief that the issuing government will keep its supply so limited that it will maintain approximately the same purchasing power.) Few people have this amount of confidence in the financial integrity of most governments. This is particularly true during and after large-scale wars, when national debts have skyrocketed, current expenses are still abnormally high, and inadequate taxes are being collected. Under these conditions, it is exceedingly likely that a government will take the easy way out of its financial difficulties and inflate either with the help of printing presses or by forcing domestic banks to grant credits. (Gold cannot be as readily depreciated as paper money because its supply cannot be suddenly inflated.)

This does not mean that people have greater faith in the continued value of gold than in that of any other national currency. It all depends on the character of the government and the conditions of the nation which issues the currency. People would prefer to have the gold equivalent of what the belga is supposed to be worth than the actual Belgian five-franc note. On the other hand, many people mine gold in order to obtain dollars, and are glad to sell their gold immediately against the possibility that its dollar price may be lowered. In other words, different national currencies vary greatly in quality,

and some may be more or less valuable than their nominal gold equivalent. In the abstract, there need be nothing unsound about an inconvertible and managed currency. Generally speaking, though, people have more trust in gold than in government money.

(If for no other reason, international politics make it reasonably certain that gold will continue to hold an important place in international payments.) The United States holds about two thirds of the produced gold, and the British Empire is responsible for approximately the same fraction of the new supply. These two countries have sufficient power for assurance that their special interests will be served. Indeed, the provisions governing the new International Fund and Bank preserve the value of gold, and both the Fund and the Bank provide functions for gold. This is examined in detail in later chapters; suffice it for the present to state that gold will continue to play a large, albeit smaller, part in the postwar period.

#### Summary

This chapter first traced the rise of gold from its use as the most reliable store of value in the earliest times to its use over the past two centuries as the world's truly basic international monetary metal. We then considered the general character of the gold standard, and indicated how the separate national economies are welded together into an international monetary system under the rules of the gold standard. Gold-losing countries must contract economically by way of suffering a decline in prices and a reduction of general imports, whereas developments of an opposite nature are required to take place in the economy of the gold-receiving country. As principles. these rules were widely understood, but in practice, they were honored more in the breach than in the observance. The system instead developed excessive brittleness, especially in the face of a widespread desire for liquidity. When depression impended, individuals would rush to become liquid, the onset of depression would accordingly be speeded up, an even greater premium would be placed on liquidity, and so on in a vicious circle.

The discussion then progressed to consider the gold standard during the interval of the two World Wars. This was the period of the sharp decline and collapse of the gold standard as a vital international institution. Countries sterilized gold instead of employing it to effectuate an expanded economy, and gold-losing countries suffered deflation and unemployment. Excessive movements of liquid funds, so-called hot-money movements, were common, and tremendously disturbing to many economies. Poor exchange-rate relationships and piecemeal depreciation of currencies served to hasten hot-money flows, although political uncertainties often predominated as causes.

United States gold policy in recent decades has displayed peculiar tendencies, few of which fitted needs based on balance-of-payments considerations. The end result was that the American Treasury cornered most of the world's gold. Our proverbial visitor from Mars would surely have little that is praiseworthy to say about a policy which requires removing yellow metal from the bowels of the earth in South Africa (and a few other places) only to return the metal to the subsoil of Kentucky.

As to the future of gold, it was indicated that it is not promising insofar as the gold standard itself is concerned. But the metal is likely to continue to be used in the settlement of international balances and to be held as a generally acceptable asset by international monetary organizations, such as the International Monetary Fund.

#### Suggested Readings

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## Chapter 29

# Exchange Reserve Standards

## The Gold-Exchange Standard

POLLOWING World War I, a number of countries wished to enjoy the advantages of the international gold standard without incurring the costs involved. These countries, therefore, adopted what is called the *gold-exchange standard*, which had already been employed by a few countries, notably India and the Philippines.

An economical form of orthodoxy was deemed necessary, and many countries were encouraged to pursue such orthodoxy by an international monetary conference which met in Genoa in 1922. As a result of war inflation, world gold production had greatly declined after 1915. A "shortage" of gold threatened because the current supply of the metal had declined and because monetary demands for it had risen (owing to the great expansion of monetary circulation requiring metallic reserves). Many countries, therefore, adopted what was to them a new policy of holding part or all of their reserves on deposit or otherwise invested in foreign money markets. London and New York were the favorite foreign centers in which reserve deposits and investments were kept. As compared with a nonincome-earning gold reserve at home, foreign deposits and short-term investments earned a small rate of interest. Many countries with modest means naturally were attracted to a system of this sort.

By anchoring their currencies to such gold currencies as the dollar, the pound sterling, and the French franc, the small countries endeavored to achieve exchange-rate stability and at the same time sought to use interest-bearing liquid foreign balances as international means of settlement. Two functions were thus served by the gold-exchange standard. First, exchange-rate stability, resulting from the tie-up with a strong gold currency such as the dollar, tended to facilitate international payments. Secondly, countries on the gold exchange standard avoided the expense of to-and-fro gold movements which normally occur from time to time during the year. These were not unimportant advantages in the eyes of smaller nations, especially in view of the prevailing conventions concerning "sound" money.

The gold-exchange standard operates about as follows. Exchange rates are allowed to fluctuate within narrow limits. generally within the usual gold points. At the gold export point, the central bank or monetary authority in the goldexchange-standard country will sell foreign exchange in unlimited amounts, but at the gold import point, it will buy foreign exchange. When foreign exchange is purchased, there is an expansion in the supply of local currency. Thus fluctuations in the supply of local currency are tied to movements in foreign trade and investment, more or less as under a full gold standard. The elimination of gold movements and the use of income-earning foreign balances as reserves give this arrangement the great advantage of cheapness. On the other hand, the successful operation of the system requires the maintenance of a large balance in the foreign country against which the gold-exchange-standard country can sell exchange. Many countries have not, however, kept all of their reserves in the foreign center. Instead, they have kept a small gold reserve at home, but the balance of the currency reserve was maintained abroad in the form of bank balances or short-term investments. Such systems remained basically of the goldexchange-standard type.

As an international monetary system, the gold-exchange standard suffers from two defects. First, such a standard may easily result in an excessive multiplication of claims against

any given total of gold stocks. The gold-standard (or base) country in effect shares its gold stocks, for purposes of currency redemption and the settlement of international balances, with the gold-exchange-standard countries by allowing the latter to keep their monetary reserves on deposit with banks in the base country. Secondly, because of such a multiplication of claims, which in effect reduces the percentage of gold reserve behind the total obligations of the several central banks, the base country is exposed to uncontrollable drains of gold to the rest of the world. Such exposure results from the fact that the financial position of the base country is not influenced by changes in conditions in the gold-exchange-standard country in the same way or to the same degree that it would be if the latter country were on a full gold standard. Under the full gold standard, any large relative change in conditions would tend to result in the base country losing or gaining gold. Alterations in its gold position would tend to bring corrective forces into play. But under the mixed system, a large relative change in conditions as between the several countries need only result in increasing or decreasing the volume of foreign claims on the base country.1 There is no loss or gain of gold in the case of this country. Instead, stresses and strains pile up in the form of unbalanced price relations and business movements. Although the contrast with the full gold standard is most marked when the comparison is with what the effects of gold movements ought to be, it is nevertheless historically true that under the gold-exchange standard corrective

¹ If claims on the base country consist, however, of sight deposits with the central bank, an increase in such claims has effects similar to a loss of gold by the base country. The reason is that the total of central bank funds available for the domestic-oredit base is reduced by an increase in the claims of gold-exchange-standard countries, just as the total is reduced by the loss of physical gold. If, on the other hand, foreign reserves are held as balances with the base country's commercial banks, as is generally the case, changes in such reserves would only effect the turnover of existing bank deposits, slowing down the turnover whenever there was an increase in foreign central-bank deposits, and vice versa. The gold-exchange standard would have worked more successfully had reserves been kept on deposit with the central bank in the base country.

forces are slow in coming into play because of the absence of changes in the magnitude of gold stocks. At bottom, the slowness is due to the fact that the stock of gold is not regarded as being reciprocally earmarked—that is, claimable both by the base country and the nations whose monetary reserves consist of demand claims on 'he base country. As the gold-exchange standard has actually operated, there have been few cases in which proper protective steps were taken in advance to meet situations of sudden difficulty traceable to the conversion of foreign central bank claims into gold. Historically, the reserve ratios against combined domestic and foreign liabilities have been too low. The claim, therefore, that the gold-exchange standard enables poor countries to enjoy the advantages of the gold standard without carrying the financial load of keeping non-interest-earning gold reserves is quite misleading. If the base country incurs the expense of carrying adequate reserves. there is a cost involved which will inevitably be shared by the gold-exchange-standard country. If, on the other hand, the base country does not pursue such a course, it is really assuming dangerous liabilities against its own metallic reserves. case, the economy of operation is largely spurious. past, the system has been a factor responsible for international monetary trouble, as witness the well-known case of the sudden withdrawal of central-bank reserves and other short-term balances from London in the summer of 1931. This behavior by gold-exchange-standard countries contributed materially to force Britain to abandon the gold standard in September of that year.

### The Sterling Area

The international monetary standard just described is the oldest and the most clear-cut of the exchange-reserve standards which have been adopted by many nations of the world. It is not, however, the only type of exchange-reserve standard. A purer type of exchange standard, in the sense that there is no necessary indirect link to gold, is the international monetary

system adopted by a number of countries after Great Britain left the gold standard in 1931. This system is briefly referred to as the <u>sterling area</u>, taking its name from the anchor currency, the paper pound sterling. As between members of the system, the pound sterling is both an international means of settlement and an international monetary-reserve currency. In the remainder of this chapter, we shall attempt to describe the sterling-area system. We shall take up first the prewar sterling area and then consider its wartime and probable postwar character.

### The prewar sterling area

Given the prestige of sterling in the international financial world and the bread-and-butter importance of the United Kingdom as a market for the exports of many raw-material producing countries, Empire and otherwise, many countries decided, after the collapse of the pound in 1931, to tie their currency to sterling rather than to continue on gold or on an independent basis. The tie-up with sterling automatically introduced a wide area of exchange stability. To be sure, the pound might shift relative to the dollar or the French franc, but members of the sterling area would at least enjoy exchange stability with sterling. Such, in brief, was the rationale used to explain the emergence of the sterling area.

How does one identify a sterling-area country? A country can be said to belong to the sterling area if, first, it maintains its currency in a fixed exchange-rate relationship with the pound sterling and, secondly, it keeps most or all of its exchange reserves in the form of sterling balances and other liquid assets in London. On the basis of such criteria, the original (1931) members of the sterling area were the British Commonwealth of Nations (except Canada, which has always remained outside) and a few non-British countries, such as Portugal and Iraq. By 1933 the Scandinavian countries of Sweden, Norway, Denmark, and Finland had joined. Iran and Latvia were included in 1936. By 1938 seventeen countries were

recognized as belonging to the sterling area.<sup>2</sup> A number of other countries had only partial membership in the sterling area. Thus, Japan, Argentina, and Uruguay generally maintained their official exchange rates fixed in terms of sterling, but they neither kept all or most of their reserves in sterling nor were all of the effective exchange rates used by them kept fixed in relation to sterling. At the time of the outbreak of World War II, the sterling area had shrunk to little more than the British Commonwealth of Nations, again with the conspicuous exception of Canada.

It was stated above that many countries decided to link their currencies to the pound sterling because of the prestige of that currency and because the British market was very important to them. We may now enlarge upon this statement. Among the reasons for the tie-up with sterling, the political factor must certainly be given a place, especially as regards the political bonds of members of the British Commonwealth of Nations. A second factor was the close financial relationship of many countries to the United Kingdom. Most of the countries concerned had large long-term debts payable in sterling, the burden of which they wished to stabilize in terms of their own currency. In the third place, there were very important commercial ties to Britain, ties which were further strengthened in 1932 by the Ottawa system of imperial preference, and in 1933 and thereafter by a series of preferential and discriminatory bilateral trade agreements between Britain and countries in Scandinavia and in Latin America. Many of the sterling-area countries sold over half of their exports to Britain. By linking their currency to sterling, they protected the prices of their exports and safeguarded their competitive position in the British market by allowing their currency to depreciate or appreciate in line with sterling. If their currency had been

<sup>&</sup>lt;sup>2</sup> Australia, Denmark, Egypt, Eire, Estonia, Fınland, India, Iraq, Latvia, New Zealand, Norway, Palestine, Portugal, Sweden, Thailand, and the Union of South Africa.

tied to gold or to a currency that had appreciated relative to sterling, they would have found that the prices of their export goods in terms of sterling would have been higher than those of their sterling-area competitors.

Close commercial ties with Britain were also valued by virtue of the fact that after 1929 British national income and business activity had fallen much less than was the case in other leading industrial nations. Thus, in 1932, at the bottom of the world depression, industrial activity in Great Britain had declined only 17 per cent as compared with 1929, whereas it had fallen 47 per cent in the United States. Finally, Britain, in addition to being the world's largest importer, had the further advantage of being a relatively steady import market. The relative steadiness of British purchases resulted mainly from the fact that imports consist largely of foodstuffs instead of industrial raw materials, as is the case in the United States. factor contributing to the comparative steadiness of the British market was the modest slump in industrial activity after 1929. which in turn was largely due to the depreciation of the pound in 1931 and the relatively limited extent of the pre-1929 expansion in business activity. All in all, therefore, one sees that there were positive advantages for a country which maintained a fixed link with sterling.

We turn next to consider the way in which the sterling area affected the economic position of outside countries. It may as well be stated at the outset that the sterling area, as such, was to all intents and purposes neutral in its effects on the rest of the international economy. The pound sterling, up to World War II, remained fully and freely convertible into other currencies. Members of the sterling area wishing to transfer any part of their sterling balances to, let us say, New York were free to do so. Although the sterling funds of members were, by mutual agreement, invested and administered for them by the Bank of England, a citizen of a sterling-area country was free to go to his local bank and arrange to make any payment he wished in England, in other parts of the sterling

area, or outside the sterling-area countries. There was one powerful factor, however, which operated to lessen drains of sterling resources to countries outside the sterling area. This was the factor of commercial policy. First by means of the Ottawa system of preferential trade between members of the Empire, and then through the use of discriminatory bilateral trade agreements with countries such as Denmark, Britain actually succeeded in diverting to use within the British Isles and sterling area sterling funds which, otherwise, would have been used to make payments in dollars, francs, and so on. Thus, by using preferential and discriminatory trade devices, Britain was able to strengthen the internal resources of the sterling area. But the strictly exchange-rate and payment features of the sterling area were entirely free of the restrictions and distasteful aspects found in the exchange and currency practices of countries such as Germany. The sterling area underwent radical changes, however, upon the outbreak of World War II.

### The wartime sterling area

One of the important defensive measures taken by England a week before the formal declaration of war in September 1939 was the institution of a system of exchange control. By means of this single stroke, the sterling area underwent a fundamental change. The free invertibility of sterling into other currencies was terminated. Britain was forced to husband her gold and foreign-exchange resources for war purposes. There was doubt as to her capacity to export in the face of total mobilization of resources for war. But since her need for imports would be greater than ever, it was felt that there would inevitably be a deterioration in her international financial position. The situation was one in which adverse effects would accelerate in snowballing fashion if her residents were freely allowed to transfer funds to other countries for safe-keeping or permanent investment.

Although Britain did not institute a water-tight exchange

control overnight—for example, there was virtually no control over the use of sterling held by nonresidents, and exporters found it possible for many months to transfer capital by the simple expedient of underinvoicing merchandise sent abroadthe sterling system was halfway to becoming a closed-currency area. Prior to the war, the sterling area represented a more or less united-currency front with full and free access to the rest of the world in strictly monetary matters. After September 1939, this was no longer the case. The emphasis now was on maximizing the mobilization of the sterling area's foreign financial resources. The private foreign wealth of Great Britain was duly registered with and subject to the disposition of the government against compensation in local currency. Subsequently, much of this wealth was transferred to foreigners as a means of paving for vital war supplies. But for many months. Great Britain and major sterling-area countries were satisfied with something short of thoroughgoing exchange control. For example, it was possible in unofficial markets abroad for foreigners having sterling balances to dispose of such balances to other nonresidents who had payments to make in sterling. As such sterling generally was sold at a discount, there developed what was called a free sterling rate of exchange, which dropped in 1940 to as low as \$3.20 to the pound. as compared with the prewar rate of \$4.68 and the new wartime official rate of \$4.03. This free sterling could be used to pay for a limited range of British exports. By the summer of 1940, however, the London authorities decided to clamp down on free-exchange dealings by requiring all payments to be made in official sterling, and from then on to the end of the war only the official rate of \$4.03 prevailed. Other loopholes were eliminated at about the same time.

The basic difference, then, between the prewar and wartime sterling-area arrangements was that the former did not employ the methods of exchange control although the latter did. Concretely, the prewar sterling-area arrangement consisted at bottom of a system in which there was nothing more than a fixed exchange-rate relationship to sterling coupled with a policy of keeping official monetary reserves in London. The wartimesterling area went well beyond these two objectives. These features were retained and, in addition, the following assumed major importance. First, in each of the sterling-area countries there developed a centralized control of foreign-exchange dealings generally patterned after and co-ordinated with that of Great Britain. Secondly, all of the member countries agreed to pool their non-sterling-exchange and gold resources in London. That is to say, all dollars earned and gold mined or acquired by, for example, Australia, and which were in excess of the value of her rock-bottom needs from the United States, were sold to the London authorities for sterling. Australia gave up claim to dollars (and newly mined gold), but increased her claims upon Britain to a corresponding amount. England acquired title to more dollars and gold, but also incurred increasing sterling obligations to members of the sterling area. The pooled dollars and gold were employed under centralized direction in the prosecution of the war. This meant that London had greater financial resources with which to make war purchases outside the sterling area (principally the United States, which was unwilling to accumulate sterling balances and which could not, because of the Neutrality Act, extend loans to Britain). It also meant that London would make available non-sterling exchange to members of the sterling area whose payment relations with non-sterling countries. even on the basis of imports trimmed to rock-bottom needs, resulted in a deficit. The adoption of the American Lend-Lease program in March, 1941, when England was virtually at the end of her dollar and gold resources, did not alter the essential financial problem facing Britain: it merely permitted the restoration, in part, of the foreign resources previously spent by that country in the prosecution of the war.

The pooling of sterling-area foreign exchange and gold resources in London was of some significance. In the first place, it involved a transfer of more desirable dollars or gold to

Britain in exchange for less desirable sterling. India, Australia, and several other sterling-area countries deprived themselves of all or most of the dollars and gold which they might have saved for postwar use, in order that Britain might have more of them than otherwise would have been the case. was not regarded as sheer gratuity by the donors because they had a growing financial stake in a solvent Great Britain. both because the latter was an important export market to them and because they were now her creditors.) In the second place, the pooling of the area's foreign (non-sterling) exchange and gold meant that exchange transactions between members of the sterling area could be largely free from control. For instance, transfers between residents of Australia or Egypt. and England could be effected about as easily as before the war. Such intra-sterling-area transfers did not increase or decrease Britain's indebtedness, but only resulted in a reshuffling of the claims on that country. As long as each member of the sterling area followed approximately the same rules3 with respect to the use of dollars and other non-sterling currencies, the sterling area as a whole remained in a position to avoid a drain of its non-sterling resources to the outside world. There was no need, therefore, to restrict intra-sterling-area payments of residents.

During the early years of the war, when all energies were concentrated on increasing the military effectiveness of the United Nations, there was comparatively little opposition to the sterling-area arrangements from the members themselves.

<sup>&</sup>lt;sup>3</sup> During the war, the individual sterling-area control systems were characterized by varying degrees of independence of action. At one extreme were the Dominions, such as Australia, New Zealand, and the Union of South Africa which (1) operated their own import controls and (2) held dollar balances in their own names (although the surplus dollars were transferred periodically to Britain in return for sterling). At the other extreme were the satellite countries, such as Iraq and Egypt and the colonies, (1) whose import controls were operated to all intents and purposes by the British and (2) which (except for Egypt) exported to the United States through British-owned companies or export monopolies. As a result, these countries did not receive dollars directly, or did so only to a small extent. India's system occupied an intermediate position.

Subsequently, however, altered circuinstances brought about different reactions. Late in the war, Britain was adding substantially to her gold and dollar resources, even though her foreign (sterling) indebtedness was growing at a more accelerated pace. And some of the major sterling-area countries were beginning to worry about the chances of being able to cash in completely on their sterling claims. India, in a few years of war (but with considerable suffering from war-induced famine and inflation), had accumulated in nominal monetary terms about as large a claim on England as the latter over the preceding two centuries had accumulated on India. Would India's postwar freedom of commercial choice be severely restricted. by virtue of the fact that she could not use the large sterling balances for the purpose of making payments outside the sterling area, so that, for example, purchases in the United States would be confined, save for possible dollar loans, to the current value of her dollar-producing exports of goods and services? Many thoughtful Indians believed such would turn out to be the case. They were further worried about the possibility of England's using the weapon of a large sterling debt more or less in the way the Germans exploited similarly situated creditors in the 1930's. Already, during the war itself, sterling-area countries were diverting from the United States virtually all trade which could be arranged with suppliers within the sterling area. Although it was generally admitted that Britain's international financial position and early postwar balance-of-payments prospects were very unfavorable, the fact remained that there were serious discriminatory possibilities inherent in such sterling-area arrangements. Enthusiastic proponents of the sterling area, however, were not disturbed by the prospects of trade patterns which might conflict with accepted views of fair trade practices. They argued, for example, that the total of world trade might be increased if some discriminatory devices could be used. They conveniently forgot that many of the most objectionable German trade practices also were partly justified on the ground that the total of international trade would actually be increased as a result of their use.<sup>4</sup>

## Some quasi-sterling-area agreements

The reader may obtain a better idea of the potentialities of sterling-area arrangements by considering some British financial agreements which were used after World War II. The principal accords were the Anglo-Belgian, Anglo-French, and Anglo-Swedish financial agreements of 1944 and 1945. All three had the following common distinguishing features: (1) the fixing of exchange rates, (2) the establishment of clearing machinery, and (3) the mutual provision of overdraft facilities or credits. We shall discuss the Anglo-Swedish agreement because it shows most clearly what is involved in a typical agreement of the sterling-area type.

The Anglo-Swedish financial agreement of 1945 was an extension of the Anglo-Swedish payments agreement of February 1940. The latter agreement established clearing machinery through which the bulk of the trade between the two countries was to be financed. Special sterling accounts were set up in London in behalf of Swedish residents, and all payments from Sweden to the sterling area and vice versa were canalized through these accounts. It was also provided that when sterling held in these accounts accumulated beyond a certain point, the surplus would be paid off in gold.

The Anglo-Swedish agreement of 1945 had three outstanding contractual features. First, it established an exchange

<sup>\*</sup>In connection with the problem of trade discrimination under sterling-area controls, the point is made by defenders of the system that the primary responsibility for the situation which leads to the introduction of discriminatory controls has with the country having a surplus on current account under conditions of underemployment. The implication is that the discriminatory controls of deficit countries will be removed when and if a condition of substantially full employment is attained by the country with a surplus current account. Unfortunately, however, the process is not automatic; far ored industries acquire a vested interest in exchange control just as they acquire a vested interest in the tariff. In other words, there is no assurance that the discrimination will be temporary and confined to special circumstances. Full and effective retaliation thus is invited when the tenuous basis for discrimination disappears.

rate of 16.90 kronor to the pound sterling. There are to be no changes in this exchange rate until after mutual consultation. Secondly, the agreement established clearing machinery, with all payments between Britain (and the sterling area) and Sweden being channeled through the Bank of England and the Swedish Riksbank. Thirdly, the agreement specified that no limits are to be placed upon the amount of overdraft facilities which each country agrees to provide the other. In other words, the balance of payments between Sweden and the sterling area may run to any size in either direction without the need for settlement. It was expected by both countries, however. that Sweden would accumulate sterling because of the expected excess of Swedish exports. (An informal arrangement was believed to have been made limiting Sweden's accumulation of sterling to 300 million kronor or about 18 million pounds sterling.) The agreement is to run for five years. Although the agreement makes no provision for the ultimate settlement of any outstanding balances, either country has the power to liquidate in gold, at any time, any of the net balance owing to it.

The point particularly to be observed about this agreement is that the mutual financial-aid provisions are drawn on narrow bilateral lines. The local currencies mutually provided in each case are to be used for payments only within the two areas concerned. Sterling balances held by Sweden can be used only to make payments owing by Swedish residents to residents within the sterling area, whereas Swedish kronor credited to Britain at the Riksbank (in exchange for the sterling credited to the account of the Riksbank) can be used only for payments by sterling-area residents to Swedish residents. The agreement, however, looks forward to eventual multilateral convertibility of balances held. It provides, for example, that "as opportunity offers" the two countries shall seek (1) to make the respective Swedish-owned sterling and Britishowned kronor balances available for making current account payments to outsiders and (2) to enable outsiders to use whatever kronor and sterling they happen to have to make current-account payments to the sterling area and to Sweden. There is also a provision in the agreement which provides that the terms of the accord shall be reviewed if, during its life, either country should adhere to a general international monetary agreement (such as the International Monetary Fund, discussed in Chapter 32).

Although the sterling area is intimately involved in the Anglo-Swedsh agreement, the accord does not bring Sweden formally into the sterling-area group of countries. Sweden is permitted to continue its own exchange-control system, and this system need not be patterned after or integrated with that of England. The agreement, however, does forge a closer link between the sterling area and Sweden, and thus may be regarded as a quasi-sterling-area agreement in the sense that it extends the area within which transactions may be settled in sterling.

What is the long-run significance of the Anglo-Swedish agreement (and the general bilateral-payments pattern used in other agreements)? The long-run implications are serious. especially if the dollar remains relatively scarce (see Chapter 32 with respect to the latter). If the dollar should remain relatively scarce, each country would have an inducement to satisfy its import requirements as far as possible from each of the other countries with which it has bilateral agreements. rather than from outside sources, such as the United States. This possibility is a real one despite the fact that none of the agreements mentioned above includes specific provisions to equate trade with each other. A bilateralizing tendency, however, will exist in the very nature of the circumstances involved. And even if each country tries to buy more from the other, it is reasonably certain (on the basis of logic and experience) that a balance will gradually accumulate on one side or the other. and that steps will have to be taken eventually to keep the balance down.

As stated above, Sweden is expected to accumulate sterling

clearing balances. Although no formal limits are imposed on the size of these balances (an informal limit is believed to exist, however, as indicated earlier), a stage will be reached when Sweden will be unwilling to accumulate further sterling balances. Sweden will then take steps to limit the rise in its sterling. There are two alternative methods of doing this. Sweden may either reduce its exports to Britain (unless paid for in gold or such acceptable foreign exchange as United States dollars) or it might increase its imports from Britain. The latter method would be what sterling-area enthusiasts call an expansionist method of trade balancing. The forced expansion in one direction would be at the expense of contraction in another-that is, the expansionist method would be discriminatory. Sweden would have to discriminate against countries such as the United States in order to divert trade to England.

The harm which these agreements would do to United States export trade would vary directly with the number of agreements and also with the degree of integration of payments between the countries concerned. Thus, if the bilateral agreements are widened and expanded into a closely knit Western European currency bloc (including the foreign satellites of these countries) and if the integration of payments takes the form of (1) settlement of balances within the bloc in sterling and (2) pooling of gold and dollars, there will be great discrimination against the exports of the United States.

The reader should not regard the internationally undesirable trade and financial practices which have been outlined as purely transitory measures. They also have a potentially important long-run significance. Although the exigencies of a difficult wartime situation were responsible for invoking the practices, the latter have a longer-run significance because a pattern has actually been developed which is not without its champions in influential British circles. But it is likely that there will be a retreat from wartime sterling-area practices, at least in the early postwar years, thanks to (1) Britain's mem-

bership in the International Monetary Fund (described in a later chapter) and (2) American loan assistance.

Here we may touch briefly upon the loan assistance. In December 1945, the President of the United States offered Great Britain a 4.4-billion-dollar, 50-year loan on very favorable terms (the interest rate specified was actually below the level at which our Treasury borrows long-term funds, and interest service would not be due in years in which Britain had a very unfavorable balance of payments) if Britain would hasten its return to a multilateral trading basis. This loan offer, which was approved by Congress in July 1946, contained numerous provisions of a commercial-policy character. For present purposes, it will suffice to state that they boil down to a single basic condition: that Great Britain hasten the implementation of its commitment under Article VII of the Master Lend-Lease Agreement, previously cited.

### Summary

As a substitute for the full gold standard, many countries saw advantages of economy in the gold-exchange standard. The latter was regarded as a cheap substitute because reserves in the form of interest-bearing deposits with a gold-standard country yielded a return, whereas reserves in the form of gold did not. While the gold-exchange standard lasted, countries were able to enjoy exchange stability rather cheaply. But they did so only at an ultimate cost to others and to themselves. The system operated to produce an excessive multiplication of claims against the full gold-standard country in which reserves were kept, and as a result, exposed the latter country to a severe drain of gold. All things considered, the system was only spuriously economical. Otherwise, it had both the advantages and the disadvantages of the full gold standard.

The sterling area, an international system that emerged when Britain abandoned the gold standard in 1931, contrasts sharply with conventional monetary standards. This system is a managed standard based mainly on the position and policies of the center country-the United Kingdom. Before World War II, the sterling area involved (1) the pooling of non-sterling currencies in London on a voluntary basis, (2) the pegging of exchange rates to sterling, and (3) the free convertibility of sterling into other currencies. Ties to the United Kingdom resulted from political relationships, financial bonds. and commercial dependence on the British market. As a result of the war and Britain's straitened financial position. the sterling area was completely changed by the introduction of exchange control. Pooling of currencies continued, but on a voluntary and semivoluntary basis, and the controls were used to divert all possible trade away from non-sterling countries to suppliers in the sterling area. A grave discriminatory potential thus inheres in the system. In addition to sterlingarea arrangements of the usual sort, the center country (Britain) has also negotiated a number of quasi-sterling-area financial agreements which are essentially the same as the clearing agreements of the prewar type. These are ostensibly transition-period arrangements, but to the extent that vested interests grow up under them, they may remain with us to plague international relations.

### Note on Britain's International Financial Position

The great change that has occurred in the English international financial position as a result of the war constitutes a major world problem. A brief statement may therefore be made about the character of this problem.

In the summer of 1939, before the outbreak of war, Great Britain was a great creditor nation. Her long-term foreign investments amounted to some 17 billion dollars whereas gold and dollar holdings totaled about 3 billion dollars. British foreign liabilities were relatively small, consisting chiefly of sterling-area reserve balances kept in London. To meet the requirements of external war finance, some 4 billion dollars of her best foreign investments had to be liquidated by the end of 1945. In addition, there was a large decline in holdings of

gold and dollars to a level of but a few million dollars by April. 1941. Finally, the net wartime increase in short-term sterling indebtedness was of the order of 15 billion dollars. Thus, by the end of 1945, Britain still retained about three quarters of the nominal value of her long-term foreign investments, but this sum was more than offset by the new short-term sterling debt, owed mainly to Empire countries. On investment account, therefore, Britain was an international debtor at the end of 1945. The gold and dollar position had improved to about the 2-billion-dollar level.

The asset-liability account, great as had been its deterioration, would not be of such great concern if Britain's postwar balance-of-payments prospects were favorable. Unfortunately, the balance-of-payments position had already worsened in prewar years, when the average annual deficit on current account for the years 1936-38 was about 200 million dollars. In the early postwar years, the current-account deficit will probably be several times this amount. The reasons are not far to seek. Investment income will be considerably less than prewar because of the sale of many of the best foreign investments. Shipping income will have declined owing to sinkings during the war. Import requirements will remain high in order to reconstruct and repair war-damaged buildings, reequip plants, restock inventories, and raise depressed consumption levels. Greater home production of some foodstuffs is expected to reduce somewhat the dependence on foreign sources of supply. But the consensus among British officials is that only a large increase in exports-given higher prices, an increase of 50 to 75 per cent over the 1938 volume is the target-will enable the country to keep its financial head above water. Even then exchange and import controls will be needed to prevent the importation of luxuries and unessentials and to obtain more favorable purchase terms from foreign suppliers.

The stern realities of the English balance-of-payments position will shape many phases of the country's foreign and domestic economic policies. Despite controls over home consumption, there may be great difficulties in actually making available a sufficient quantity of goods and manpower to enable the country to take maximum advantage of the immediate postwar export demand. Long-term lending policy will also be vitally affected. If any exports are to be sold on long-term credit terms there will be a deterioration in the capital account. in addition to that in the current account of the British balance of navments. Clearly, large-scale foreign lending will not be nossible until the balance-of-payments position is in good shape. For the same reason and notwithstanding the 4.4 billion dollar loan that was approved by Congress in 1946. Britain will not be able to permit convertibility, except to a limited extent, of foreign-owned sterling balances into currencies such as the dollar. Britain's sterling indehtedness will present problems rather similar to those of the Inter-Ally war debts of World War I. The fact, however, that the bulk of the sterling balances is held by sterling-area countries should facilitate the ultimate solution. Unlike the debts of World War I, which were serviced until suspended within a multilateral-payments-and-trade framework, the sterling debt may be settled only by using bilateral and discriminatory devices. International consent to the use of such devices during at least the first five postwar years was granted at the International Monetary Conference held at Bretton Woods. New Hampshire, in 1944. Subsequent to this Conference, however, the United States used its chief bargaining weapon, a dollar loan, to commit Britain to expedite its return to a multilateral trading system. Specifically, after July 1947 any nation selling goods and services to Britain must be permitted the free use of the sterling proceeds of such sales for any and all current transactions.

Another troublesome problem will be that of the appropriate rate of exchange for sterling. Will depreciation make a real contribution towards improving the British balance-of-payments position? Although some depreciation may be required

over the longer run because of the decline in invisible exports, it is doubtful whether depreciation would be helpful in the years immediately after the war, the more so in view of the large American loan of 1946. Because world commercial trade has been literally in the doldrums since 1941, there is a huge pent-up demand for manufactures of all sorts. British exports, on the other hand, will have to compete with pent-up domestic demands. As a result, both the foreign elasticity of demand for English goods and their elasticity of supply will be low (but above unity). Without a very great depreciation of sterling, the foreign value of British exports is unlikely to be greatly increased. Nor is depreciation likely to produce a significant decline in the value of British imports, owing to the fact that the elasticity of demand for imports and their foreign elasticity of supply will also be low (but above unity).

Suppose, however, that the British and foreign-demand elasticities are below unity? Such a situation is not unlikely. Britain will then obtain fewer units of foreign currency for any given volume of exports. In such circumstances, therefore. the British balance of payments will be worsened by a policy of depreciation. Of interest in this connection is the French exchange-rate experience following liberation in 1944. The Allies agreed to an overvalued rate for the franc of 2t. view of the fact that France would be in no position to expand exports for many months, and that she was in very great need of imported materials and equipment to expedite economic reconstruction, the artificially high exchange rate was a real blessing. The foreign-currency cost of imports was kept lower than it would otherwise have been. On the export side, France could not have materially increased her foreign earnings from sales abroad, simply because the goods were not available for export. Finally, owing to the difficult inflation problem of the time and the presence of large numbers of free-spending Allied troops on her soil, an overvalued franc automatically limited troop spending. Our soldiers, for example, would have had more to spend had they received something nearer a fair

value of, let us say, 100 to 125 francs per dollar, instead of the official rate of 50 francs. France subsequently fixed the value of the franc at 119 to the dollar in December 1945.

To return to the British problem, it is apparent that little is to be gained over the short term from a policy of depreciation. The solution would seem to be found instead in a combination of transitional exchange control, to curb unessential imports, and greatly improved productive efficiency to enable Britain to achieve the twin objectives of an expansion of export volume and a reduction of unit cost. The task is bound to be difficult, especially if there is a true resolve to eschew discriminatory methods.

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### Chapter 30

# The Exchange Stabilization Fund

THE decade of the 1930's, which saw the introduction of so many innovations in the field of international economics, also witnessed the advent of a device for conscious national exchange-rate management—the exchange stabilization fund. The international governor of exchange rates—namely, the gold standard—was left high and dry in large areas of the world when Great Britain abandoned the gold standard in the fall of 1931. In an economically interdependent world, such a development could not fail to have important repercussions upon the international position of other nations.

## Stabilization versus Exchange Control

Before considering the repercussions of Great Britain's abandonment of the international gold standard, we should point out that if a condition of freely fluctuating exchange rates was to be avoided, Britain had a choice between at least two methods of handling her exchange-rate problems after severing the link with gold. One method would have been that of formal exchange control; the other that of exchange stabilization. These two methods are alternative but not complementary means of attacking the same general problem.

The basic difference between exchange stabilization and exchange control is that the former operates through the regular foreign-exchange market whereas the latter displaces the market mechanism. If a country elects to manage the foreign value of its currency by means of an exchange-stabilization fund, private individuals still enjoy the customary facili-

ties of banks, and exchange dealers and transactions proceed without restriction. The monetary authorities carry out their rate-stabilization operations merely by participating in the market, the exchange rate being affected to the extent that, and only in so far as, the operations of the authorities alter the volume of market transactions.

In the case of exchange control, on the other hand, the authorities take direct action; they fix the level of the exchange rate (or rates) and also prescribe the conditions under which foreign currencies may be bought and sold. This is what is meant by saying that exchange control displaces the market mechanism. An exchange rate which would lead to overbuying under free-market conditions could easily be maintained by an exchange-control authority through the simple expedient of denying certain prospective demanders the right to acquire exchange. The use or the threat to use compulsion is an essential feature of exchange control.

Now, bearing in mind the contrasting character of exchange stabilization and exchange control, we may indicate the reasons why countries prefer one device over the other. Exchange stabilization is likely to be preferred by countries in which the following circumstances are found to prevail: (1) the balance of payments is in only a mild and temporary state of disequilibrium, (2) gold and foreign-exchange reserves are equal to about one year's average current-account debits, (3) the country has traditionally been prominent as an international financial center, (4) an essentially liberal and nondiscriminatory commercial policy prevails, and (5) political freedom is a prized and jealously guarded privilege.

In the absence of any of the above-listed circumstances, it is likely that exchange control will be instituted to effect exchange-rate management. Thus, a condition of severe and persistent disequilibrium in the balance of payments, which threatens or is believed to threaten the exhaustion or near exhaustion of the country's international reserves, will in all likelihood be combated by the introduction of strict exchange

control. The stabilization technique would clearly provide only transitory aid. Another consideration is the size of a country's international reserves. Small international reserves would almost force the imposition of exchange control unless the country was indifferent to a substantial depreciation of its currency. (In this case, some depreciation would probably have preceded the imposition of exchange control.) As for a country which had been important as an international financial center, it is almost certain that its banking and insurance income from foreign sources would be unfavorably affected under exchange control. Such a country would have a marked preference for exchange stabilization, particularly since the country would also probably possess adequate international reserves. The country in question would probably first allow its currency to depreciate somewhat in order to facilitate adjustment, and would then introduce a formal system of exchange stabilization. Finally, if a country was not averse to practicing a discriminatory commercial policy and if political freedom had been seriously abridged, exchange control would almost certainly win by default. It is no accident that trade discrimination and exchange control were pushed to their worst extremes in countries with weak democratic institutions

### Reaction to British Stabilization

Abandonment of the gold standard by the British meant that the pound sterling would depreciate. In a world of growing unemployment and depressed trade, Britain could obtain trade benefits, momentary or of some duration (depending on circumstances), by depressing its exchange rate below the level at which foreigners would regard it as a matter of indifference whether they purchased their imports from British or from other sources. Other countries, therefore, might retaliate against such British policy. Moreover, as the pound had lost its firm anchor to gold, exchange-rate fluctuations would likely be of considerable amplitude, thus tending to disturb trade. It was mainly for these two reasons that the British established

in 1932 what they called the Exchange-Equalization Account, the world's first real exchange-stabilization fund.

In 1933, as was expected, the United States adopted an exchange-depreciation policy of its own, which was essentially retaliatory to British exchange depreciation. Our government raised the dollar price of gold by stages from the old price of \$20.67 per ounce until the price of \$35.00 was finally established in early 1934. At the latter price, the gold content of the dollar was only 59.06 per cent of its former level. By such means we offset or more than offset any advantages which the British had obtained by their own policy of exchange depreciation. That is to say, the dollar could now be purchased with fewer units of currency in the nations, such as France, which were still adhering to the gold standard. (This is a very rough description of the exchange history of these years, but it will do for present purposes.) After the American authorities had depreciated our currency, they were anxious to prevent action by other countries designed to give the latter a new competitive exchange advantage over the dollar. Our authorities were anxious, that is, to stabilize the dollar at its new level. They established, therefore, the Exchange-Stabilization Fund.

What are the general characteristics of an exchange-stabilization fund? We may define such a fund as a collection of assets (gold or dollars, for example) held by the central bank or monetary authority in order to buy and sell foreign exchange and gold for the purpose of preventing undesirable fluctuations in exchange rates. An exchange-stabilization fund thus does not seek rigid stabilization of exchange rates, but seeks to keep them more stable than they would otherwise be. In this sense, therefore, the term stabilization is misleading. Moreover, being concerned with ironing out excessive exchange fluctuations, an exchange-stabilization fund is not supposed to resist long-term trends in the exchange rate. After all, the gold

<sup>&</sup>lt;sup>1</sup> As compared with exchange rates under the gold standard, those which prevailed during the operation of stabilization funds were subject to considerably greater fluctuations, as may be seen from the dollar-sterling exchange

standard was abandoned because it called for resistance to the forces which, if left to work themselves out, would make any given level of the exchange rate an untenable one. As an institution, therefore, the exchange-stabilization fund is a compromise between full national sovereignty over international monetary policy, as is the case under exchange control, and the requirement of adaptation to external economic forces, such as is called for under the world monetary system known as the gold standard.

We may now turn to consider the operations and limitations of a typical exchange-stabilization fund. We shall analyze the major features of the American fund.

#### The American Stabilization Fund

The Exchange-Stabilization Fund of the United States was an outgrowth of the devaluation of the dollar under the Gold Reserve Act of 1934. As a result of the reduction of the gold content of the dollar to 59.06 per cent of its former level, a total of 2.8 billion dollars of gold "profits" accrued to the Treasury. Of this sum, 2 billion dollars in gold was set aside as the resources to be used by a department of the Treasury (the fund) to stabilize the exchange value of our currency. At first, all the resources of the fund consisted of gold, but after a short while 200 million dollars of its gold was converted into a dollar palance at the New York Federal Reserve Bank

rates shown below. The period 1924-1929 was a period during which gold-standard conditions prevailed except for the first year, whereas managed-currency systems prevailed during 1934-1939.

# ANNUAL AVERAGE STERLING RATE OF EXCHANGE (dollars per bound)

1007		****	
1924		1934	5.039
1925	4.828	1935	4.902
1926	4.858	1936	4.971
1927	4.861	1937	
1928	4.866	1938	
1929	4.856	1939	

by crediting the latter with an equivalent amount of gold certificates obtained from the Treasury in exchange for gold.

Fortified by a supply of dollars, our fund was in a position to carry out its functions in the following manner: Whenever the foreign demand for dollars became particularly heavy, the fund would enter the market as a purchaser of foreign currency or gold through its agents, usually the large New York banks. The heavy foreign demand for dollars meant that American banks were acquiring foreign-currency balances at a faster rate than that at which they were currently selling them in the market. In the absence of intervention by the fund, American banks would be forced to buy and sell foreign currencies, because of the underlying supply-demand relationship, at a lower dollar price per unit. That is to say, in the absence of intervention by the fund, foreign currencies would depreciate and fewer units of our currency would be required to acquire a given quantity of a foreign currency. In cases of this type, however, the fund would supply the market with dollars by acquiring the surplus foreign currency in the hands of our banks. Alternatively, the fund would buy gold shipped to the United States by the foreign country experiencing the heavy demand for dollars. Through measures of this sort, the heavy foreign demand for dollars was offset by a correspondingly heavy American supply of dollars. The exchange rate thus was kept relatively steady.

The fund was a very cautiously operated institution, not wishing to assume risks of possible exchange losses on its transactions. As a general rule, therefore, the foreign exchange bought was immediately converted into gold in foreign markets. In other words, the release of dollars to the American market on the occasion of purchases of foreign currency was offset, during the same day, by the acquisition abroad of a like dollar amount of gold. The gold acquired in foreign centers either was immediately imported into the United States for the fund's account or held abroad temporarily as earmarked gold pending its import at a later date into the

United States. On arrival in the United States, the fund could transfer the gold to the Treasury which, acting for the fund, would turn over gold certificates to the Federal Reserve Bank, and thus replenish the fund's dollar balance at the latter institution.

A parallel procedure was followed whenever there was any tendency for the dollar to depreciate—that is, whenever the rate at which the American banks were selling foreign currency exceeded the rate at which they were buying such currency. If the fund was not prepared to intervene in such cases, the banks would be forced to buy and sell foreign currencies at progressively higher dollar prices per unit. In order to keep the exchange rate steady, therefore, the fund would take steps to augment the supply of foreign balances available for sale by American banks. It would do so (1) by exporting gold, (2) by releasing gold from amounts held on earmark abroad, or (3) by transferring gold to foreign earmarked accounts in the United States. In each case, the fund would eventually acquire dollars in return for gold. It could replenish its supply of gold at any time by exchanging such dollars for gold at the Treasury.

We thus see that the resources of the stabilization fund, on the above basis of operation, always remained intact. The fund was, in effect, a revolving account. If the situation in the exchange market called for supporting foreign currencies, the fund lost dollars to the market, but acquired gold. If, on the other hand, the dollar needed support, the fund lost gold to foreigners, but acquired an equivalent amount of dollars.

The question may be asked whether the American stabilization fund operated about equally on the two sides of the market. Such was not the case. From its inception in 1934 to the outbreak of World War II in 1939, the fund's operations were mainly one-sided. Basically, this was because the dollar was not in need of support. Foreign currencies, particularly the continental gold-bloc currencies, such as the French franc, were vulnerable at that time. In the face of world depression.

sterling depreciation since 1931, and the devaluation of the dollar in 1934, the continental gold-bloc countries were suffering export and balance-of-payments difficulties. There was a persistent tendency, therefore, for the exchange rates of these countries to be under pressure. However, an even more important problem confronted the American stabilization fund.

This was the problem of the British pound-sterling rate of exchange. Our fund was strongly opposed to a renewed depreciation of sterling in relation to the dollar, such as occurred between the period when Britain went off gold in September 1931 and the beginning of the American program of raising the dollar price of gold in 1933. (It was feared that a renewed depreciation of foreign currencies would discourage American exports and therefore further depress business activity and worsen employment prospects.) Since we had depreciated the dollar by merely offering to pay more paper dollars per ounce of gold, the American authorities were most anxious to prevent the British from depreciating sterling by the simple expedient of raising the sterling price of gold. We could combat any British move of this sort by two devices. First, mainly by matching every increase in the sterling price of gold with a corresponding increase in the dollar price of the metal (up to the statutory limit of double the old price of \$20.67 per ounce). The mere threat of doing this would serve to keep the British in check because we possessed greater resources. Secondly, it would not be so necessary to rely on the threat of a higher dollar price of gold if the United States would not co-operate with the British on exchange matters.

The result was that for the first year and a half of existence of the American stabilization fund there was no co-operation between the British and American funds. Officially, the explanation was that since the British did not offer to sell gold at a fixed price, hourly fluctuations in the sterling exchange rate would mean that any purchases of sterling by the American fund would be subject to the risk of exchange loss if the slightest delay occurred in the conversion of sterling balances into gold. The American authorities, therefore, refused to offer the British fund the privilege of buying gold in our market at the fixed dollar price.

One of the results of the American decision was to prevent American gold from being attracted to England should a high price be fixed unilaterally by the British fund. It is important to note, however, that the British fund was kept in check, not so much by this decision of the American fund as by the basic threat to raise, if necessary, the dollar price of gold. In consequence of the non-co-operation between the two funds, the dealings of each were largely confined to operations in French francs and other gold-bloc currencies, the holding of which did not involve exchange losses because they were convertible into gold at a fixed price. Operations between New York and London, and vice versa, thus took place mainly by way of Paris.

It will be observed from the above discussion that the American stabilization fund did not provide real support for foreign currencies. This is an important point. The support really came for the foreign central banks and treasuries which released gold for export to the United States (or for earmark to the account of the United States) when their own currencies were under pressure. Exchange stabilization thus really depended on the willingness of foreign countries to release gold. The currency support was essentially of the same sort that occurs under the gold standard, the difference being that in the 1930's there was no intention of maintaining an absolutely rigid exchange rate between the dollar and the non-goldstandard currencies. Since the American stabilization fund did not support the exchange rate, what was the principal purpose of the fund? The answer is that its chief purpose, under the conditions which prevailed, was to assist in the transfer of gold to the United States, and thus to steady the exchanges, on the relatively few occasions when normal private gold arbitraging2 proved inadequate to the task.

<sup>&</sup>lt;sup>2</sup>See Chapter 7 for an illustration of gold arbitrage.

From time to time the flow of capital to the United States became so heavy that the volume of gold moving to America was insufficient to keep the exchange rate from falling below the gold import point. Since such a situation rarely occurs in peacetime, how could it be accounted for at this time? The answer is that private gold arbitrageurs occasionally were unwilling to assume the risks of unusually heavy shipments of gold to the United States for the following reasons: (1) There was some fear as to whether the \$35.00 price for gold would not be reduced before foreign gold could be sold to our Treasury. especially as the Supreme Court early in 1935 was in the process of rendering a decision on the validity of the gold clause in dollar contracts. (Had this clause been upheld by the Court, foreigners holding gold-clause dollar bonds would have been entitled to receive \$35.00 for every \$20.67-the cld gold price-of contract or nominal bond value. The President might have restored the old gold price or set one below the \$35.00 level in such a case. In any event, foreigners actually were trying to ship unusually large amounts of gold into the United States in order to take advantage of the \$35.00 price in case this price should shortly be reduced.) (2) In some instances marine-insurance underwriters were unwilling to provide the necessary insurance for unusually large shipments of gold on single vessels. (3) Now and then there was an actual shortage of specially designed vessels to carry gold bullion. In the above circumstances, the American stabilization fund performed a useful service by making available dollars against foreign earmarked gold, and otherwise assisting the transfer of gold to the United States.

## The Tripartite Agreement

There is one development during the life of the American stabilization fund which merits separate discussion. When the fund was established in 1934, most of Europe's leading currencies other than the pound sterling were still attached to the gold standard. Our fund relied on these gold-bloc currencies as convenient centers from which to operate in other foreign currencies, since the fund was able to convert any balances quickly into gold, and thus avoid exchange risks.

In the fall of 1936, however, after several years of an over-valued franc, France allowed her currency to seek a lower level by terminating her policy of selling gold at a fixed price. Switzerland and Holland followed suit almost immediately, and Belgium a short while thereafter. Each established a stabilization fund of its own. In order to have co-ordinated action, an arrangement, known as the Tripartite Agreement, was entered into between the United States. Great Britain, and France in September 1936 to which Switzerland, Holland, and Belgium adhered shortly thereafter. The countries pledged themselves to avoid excessive exchange fluctuations, and agreed not to engage in competitive exchange depreciation. They agreed, moreover, that each country's existing exchange rate would not necessarily be maintained should foreign or domestic considerations require a lower or higher rate.

The Tripartite Agreement was characterized by a novel method of selling gold to member stabilization funds. Each fund agreed to sell to the other gold for export or earmark at a fixed price to be guaranteed for 24 hours. By means of this arrangement, each of the six stabilization funds was able to hold the other's currency for a 24-hour period without risk of exchange loss. The separate funds would cable each other daily as to the prices in their own currency at which they would buy and sell gold for the next 24 hours. The initiative in determining the day-to-day level at which the exchange rate was to be maintained was lodged by agreement with the country having the relatively weak currency. The procedure of rate-making by the latter was simple: it merely changed the price in its own currency at which it would buy gold. Assistance by the American stabilization fund took the form of buying the other currencies in the market at rates equivalent to the foreign price of gold. In order to avoid an exchange loss,

however, the American fund would convert its foreign balances into gold within 24 hours.

The role of the American fund thus was entirely passive. Moreover, it could not be otherwise as long as the United States maintained the price of gold at \$35.00 per ounce. On a few occasions, however, the United States threatened to alter the price of gold. It did so in order to frighten foreign stabilization funds so that they would be loath to carry out exchange-depreciation policies of their own. A case in point is the experience in the latter part of 1938, when the British fund allowed sterling to depreciate for a time, only to restore the value of that currency when the United States threatened to use its statutory power to raise the price of gold above the \$35.00 level. (The reader will note that at an unchanged local-currency price for gold in foreign centers, a higher American gold price means a higher dollar price per unit of the foreign currency—that is, a depreciation of the dollar. Since the United States had a favorable balance of payments and also held the lion's share of the world's gold, we could play the competitive-depreciation game longer than any other country. As stated earlier in this chapter, American policy was opposed to a large depreciation of sterling because such a course would make American goods more expensive than British goods in foreign markets, discouraging American exports and thereby increasing our unemployment.)

The effective operation of the Tripartite Agreement came to an abrupt end with the outbreak of World War II. Free-exchange markets, eliminated by the belligerents, were replaced by formal exchange-control systems. As was indicated at the beginning of this chapter, there is no place for an exchange-stabilization fund under the rigid regulations that characterize exchange control.

The Tripartite Agreement, although introducing some novel stabilization features and laying the basis for genuine exchange co-operation, did not bring about needed reforms. It did not,

for example, give rise to a system of genuine mutual currency support. In this respect, there was little change as compared with the situation prior to the signing of the Agreement. Currency support continued to come only from the countries which were prepared to release gold whenever their own currency was subject to pressure. As long as stocks of gold in the hands of the major countries were sufficient to permit periodic releases to other countries, as in fact was the case during prewar years, it did not matter whether a system of genuine currency support existed. This point is worthy of note because it provides an informative contrast to the situation that is likely to prevail after the war, when the major trading nations will have relatively little gold.

The Tripartite Agreement, at least as it actually operated. was deficient in a second respect: It did not provide a mechanism under which, by means of the exchange of technical information and consultation, co-ordinated measures could be taken by all signatory countries against the underlying difficulties giving rise to erratic capital movements and unstable balance-of-payments relations. Perhaps such action would have been agreed upon, however, if the European political situation had been less disturbing. Notwithstanding the shortcomings of the Agreement as it actually operated, it had two implicit features of significance: It implicitly called for a system of currency support, although this was confined to a mere 24-hour period. Mutual currency support was not pushed more than it was mainly because gold stocks were generally adequate at the time. In the second place, the Agreement implicitly called for a system of international consultation, especially for the purpose of avoiding competitive exchange depreciation. As will be seen in a succeeding chapter, these implicit features were made explicit and given great prominence in an international institution of broad powers which was established to handle postwar exchange problemsthe International Monetary Fund.

## Agreements with Latin America

Our discussion of the American exchange-stabilization fund would be incomplete without a brief analysis of its major activities during World War II. Apart from its role in buying gold from, and selling gold to, foreigners, its main activity subsequent to 1939 consisted of the negotiation and operation of a series of bilateral stabilization agreements, especially with Latin American countries. The outbreak of war was a severe blow to the volume and prices of exports of many of the latter countries, as the continental European market, now virtually closed to them, regularly absorbed a sizable fraction of their foreign sales. The general expectation, therefore, was that the currencies of these countries would be subject to considerable pressure unless they received a measure of support from abroad.

It was for the purpose of providing this support that the American stabilization fund entered into stabilization agreements with Argentina, Brazil, Mexico, and one or two other Latin American republics. These agreements, which were patterned after an earlier bilateral exchange-stabilization' arrangement made with China in 1937, provided that the American stabilization fund would purchase up to specified amounts of the other country's currency (that is, lend dollars) and that the other country subsequently would repurchase such currency at the same exchange rate at which the American fund had purchased it. The signatory countries also agreed to consult with each other from time to time with respect to matters affecting the exchange rate.

By these means each country was assured that its exchange rate would be maintained in relation to the dollar. The American fund was prepared to buy and hold such foreign currencies—that is, in effect lend dollars to other signatories. In so doing it introduced an important policy innovation, since it now provided genuine support for the currencies of countries not having rigid exchange-control systems of their own. It should be pointed out, however, that all of the

bilateral stabilization agreements did not involve such genuine support by our fund. In some of the agreements, our stabilization fund required a 100 per cent gold collateral, but in others no collateral was involved. In the former cases no genuine support was given to the other country, since the stabilization agreement did not add to the other country's foreign monetary reserves.

### Summary

Exchange-stabilization funds were established during the 1930's in an effort to prevent excessive fluctuations in exchange rates after the abandonment of the gold standard. The funds were designed to permit national monetary authorities to combat retaliatory exchange depreciation and to smooth out dayto-day and seasonal fluctuations in exchange rates. The American fund, which was essentially a reaction to the establishment of the British fund, intervened in the exchange market from time to time as a buyer or seller of foreign exchange, stabilizing the market by the simple process of offsetting excessive private selling or excessive private buying. In the main, the American fund operated to permit the support of other currencies, chiefly the continental gold currencies. It did so by facilitating the transfer of foreign gold to the United States. The basic supporting operation thus was carried out by the foreign countries which released gold for export. As to the basic purpose of stabilization, it may be said that our authorities were bent on preventing competitive currency depreciation because domestic depression tended to be made worse by the depreciation of the currencies of other important countries.

The Tripartite Agreement of 1936 represented a distinct improvement in the relations between the different stabilization funds, although during the period of its operation few new benefits were obtained. The Agreement was more important for its implications than for the positive contributions which it made up to the outbreak of World War II. It was

also pointed out that the implicit features of the Agreement were later incorporated in the broad international monetary agreement of 1944, which established the International Monetary Fund.

The American stabilization fund also entered into several exchange-supporting stabilization agreements with Latin American countries after war had broken out in Europe. Some of these agreements represented the first cases in which the American fund offered genuine currency support, in contrast to the essentially passive role which the fund played during the 1930's.

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### Chapter 31

# The Shortage of Dollars

OREIGN countries, desirous of making purchases in the United States, have been having difficulty since about 1930 in obtaining what they regard as an adequate quantity of dollars. A variety of devices, principally those involving some form of exchange control, have been employed by foreign countries in order either to reduce the total of dollar obligations incurred by these nations or to channel such obligations in directions that national governments conceive to be in their best interests. Whenever other governments use exchange control for these purposes, complaints inevitably arise. Foreign'citizens who are denied dollar exchange feel that they are unfairly restricted by their own government. In such cases it is common to hear complaints that a competing importer down the street was favored because he was granted dollar exchange to pay for a similar or no more essential type of merchandise of American origin. American exporting firms also may voice complaints, coupled with strongly worded requests that our State Department endeavor to have foreign governments alter their controls so that the exporters may continue to ship their products to, and receive payment from. the exchange-control country. What is even worse, restrictions of the above sort generally involve more or less discrimination between countries. International political relations may suffer in consequence. The problem of the world's supply of dollars is therefore a very real one. But is there, as is alleged, such a thing as a "chronic shortage of dollars"? That is to say, are the economic and financial conditions in the United States and in the rest of the world so rigid that the monetary claims of the United States on the rest of the world must exceed, year in and year out, the rest of the world's claims on us?

Before tackling this problem directly, several preliminary observations may be made. The question of the supply of dollar exchange does not relate to international financial problems incident to war. Thus, the circumstances which led to the United States lend-lease policy in 1941, for example, should not be included within the scope of the present chapter. Similarly, in the immediate postwar years the demand for American merchandise to aid in rebuilding a war-torn world will be abnormally high and world exports, exclusive of those of the United States, abnormally low. These early transition years constitute a special period. In so far as the United States contributes goods to war-devastated areas it will be in large degree on a relief and long-term loan basis. The scope of our discussion will be confined, therefore, to what are generally referred to as normal peacetime years, when the only condition on which goods are made available in international commerce is that they be paid for.

### The Factual Basis

The principal factual basis for the allegation that there is a world chronic shortage of dollars is to be found in the status of the prewar American balance of payments. The Department of Commerce has shown the results both in the form of the conventional balance-of-payments statement, which we reproduced as an appendix to Chapter 8, and also in the form of a statement of the world supply and use of dollars. The latter form, which is but a rearranged balance-of-payments statement, is shown below for the period 1934-1939.

During the six years preceding World War II, the international financial position of the United States was such that the rest of the world had to borrow from us and ship us gold to the extent of 3.8 billion dollars. This situation had pro-

WORLD SUPPLY AND USE OF DOLLARS, 1934-1939° (in billions of dollars)

	1934	1935	1936	1987	1938	1939	Total 1934-39
A. Dollars used by outside world  B. Dollars supplied by	3.2	3.7	4.3	5.0	4.4	4.4	25.0
the U.S. to the outside world	2.6	3.4	3.7	4.5	3.3	3.7	21.2
C. Dollar shortage: A - B	0.6	0.3	0.6	0.5	1.1	0.7	3.8

<sup>&</sup>lt;sup>a</sup> Source: Rearranged from Lary, H. B., and others, United States in the World Economy, p. 216. Washington, 1943.

found effects upon the financial, trade, and exchange positions of many countries. It was clearly a situation which could not go on indefinitely, if for no other reasons than because stop-gap borrowing could not go on without end and because the total of gold held by the outside world was limited. Nor would other countries have refrained from employing even stricter controls against the use of dollars had the trend continued.

What were the factors accounting for the observed shortage of dollars during this prewar period? The principal factor was the regular favorable balance of payments on current account, which at bottom represented the effects of deep depression in the United States by producing a large excess of American exports over imports. The other general factor responsible for the observed results was the excess of long-term capital received by the United States. During this period the United States, on balance, was borrowing from the rest of the world. The borrowing, to be sure, did not take the shape of the formal granting of loans to the United States. In the main, it consisted of refugee funds used to purchase outstanding American securities. Such net imports of long-term capital by the United States represented a perverse movement of

funds because the United States, as the world's wealthiest country with record sums of idle savings, should have been lending and not borrowing net. As far as the observed shortage of dollars is concerned, however, it is important to note at this juncture that the main factor appears to have been the large American export surplus.

### A Chronic Shortage

We turn now to consider the thesis which purports to account for a chronic shortage of dollars. This thesis runs about as follows: (The United States, with its abundant and diversified natural resources and highly industrialized economy, has relatively little need for imports. Foreign countries, on the other hand, being less developed, generally have a large demand for our mass-production goods.) Stated differently, foreign sales represent a small part of our national income, whereas imports of American origin represent a large percentage of foreign national income. Fluctuations in the value of our imports thus play a major role in determining the national income level of the foreign countries that supply us with raw materials.

Stated differently, the marginal propensity of the outside world to import American goods is higher than the marginal propensity of the United States to import. (A high world marginal propensity to import our goods simply means that a large fraction of every increase in foreign income is directed to the purchase of American merchandise.) (The conclusion of this thesis is that a given increase in American imports will cause, through its effects on foreign income, an induced expansion of American exports which will tend to exceed the initial expansion of our imports, thus worsening the balance-of-payments position of foreigners. There will be a shortage of dollars, therefore, regardless of the amount of dollars made

<sup>&</sup>lt;sup>1</sup> The thesis is that of Kindleberger, C. P., in Harris, S. E, ed., Postwar Economic Problems, pp. 379-381. New York: McGraw-Hill Book Co., 1943, and American Economic Review, Supplement, March, 1943.

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available to the rest of the world. A solution can be found only over the very long run, during which time continuing exports of American capital goods and the industrialization of foreign countries will reduce the foreign marginal propensity to import American goods to an appropriate level.)

What are the merits of this thesis? Despite its plausibility. it suffers from several defects.2 (First, if a rise in American imports induces an even greater proportionate increase in our exports, the opposite should occur when American imports fall. That is to say, on this thesis the balance-of-payments position of foreigners should improve when American imports decline.) The statistical record, however, does not bear out this conclusion. American balance-of-payments experience since 1919 shows virtually no correlation between the fluctuations in our imports and the balance-of-payments position of other countries. (In the second place, the thesis requires for its validity that the foreign marginal propensity to save be zero. If this propensity is not zero, foreign imports will not rise to a proportionately greater extent than the increase in our imports.) Let us illustrate what is involved by the use of some hypothetical figures and conditions. The assumptions are the following:

- The United States and the world start from a position of balance.
- The United States increases its imports by 100 million dollars per month,
- In foreign countries the following marginal propensities exist:
  - a. To import United States goods
    b. To save
    c. To consume domestic goods and services
    42

Because of 3c, foreign national incomes rise by 200 million dollars a month in accordance with established multiplier prin-

<sup>&</sup>lt;sup>2</sup> The authors are indebted to Dr. Arthur I. Bloomfield of the Federal Reserve Bank of New York for the basic ideas involved in the refutation of this thesis.

ciples. With a marginal propensity to import American goods of 3/8, however, American exports will rise by only 75 million dollars monthly as a result of increased American imports. It will be seen that the rise in American exports is less than the increase in imports. The same result is obtained as long as the marginal propensity to save is positive. Unfortunately for the thesis, there is scarcely any case where the marginal propensity to save is not a positive quantity. In the third place, the thesis involves the assumption that foreigners cannot get durable capital and consumer goods from other countries. Yet, the United States has a monopoly of the production of only a handful of goods, none of which is significant in the balance of payments of foreign countries. Apart from the foreign demand for replacement parts and for equipment for plant expansion in instances where American types of machinery have already been installed, other countries have great latitude in placing orders for capital and durable consumer goods. American price terms are generally the most favorable at the existing pattern of exchange rates, then there is a presumption that the exchange rates of other highly industrialized countries are overvalued. This follows from the elementary fact that several other countries are also capable of producing the same wide range of durable goods. Under normal peacetime conditions one does not think of the possibility of a shortage of General Motors automobiles, simply because Chrysler, Ford, and other producers will make competitive adjustments in the prices or quality of their products. Argument by analogy has its limitations, but this purely domestic case is suggestive.

# Temporary Shortages

If, then, the alleged chronic shortage of dollars must be dismissed as a defective argument, in what sense or senses is it appropriate to speak of a temporary shortage of dollars? Three senses may be distinguished: ((1) The exchange market sense, (2) the status of the American balance of payments on

current account, and (3) the discrepancy between the supply and use of dollars.)

At any given exchange rate, the demand may exceed the supply of dollars in the exchange market, in which case a shortage may be said to exist. Typically, however, this shortage is made up by gold and equalizing short-term capital movements.

The second sense in which it is possible to speak of a dollar shortage is in terms of the American balance of payments on current account. A persistent credit on current account is regarded by some as presumptive evidence of a shortage of dollars. Clearly, however, the United States also makes dollars available to the rest of the world through long-term capital transactions. Whenever the credit on current account is offset by a debit balance on long-term capital account, there is no shortage of dollars, unless it is demonstrated that offsetting net long-term capital exports from the United States are directly induced by the state of the balance of payments on current account. In the United States, however, there is seldom any direct connection between the status of the current account and the magnitude of our exports of long-term capital. erally the causation runs the other way: from long-term capital movements to the status of the current account. Net long-term foreign lending, by operating to raise foreign national income, tends to determine foreign expenditure on current goods and services from the United States.

In the third sense, that of an excess of dollars used over the amount supplied, the shortage is similar to the case involved in the first sense, except that a longer period of time, usually a year, is involved. The gulf between the amount used and the amount supplied is bridged by so-called short-term balancing items—gold and short-term capital. As a statistical picture, which is all that can be claimed for it, the one difficulty with this third approach is the distinction between that part of the balancing items which really consists of autonomous capital movements—that is, movements unrelated to the position of

the balance of payments, and that part which is induced by the status of the balance of payments. To the extent that the figures which are shown in the official Department of Commerce balance of payments under the category of balancing items consist of autonomous movements of short-term capital, adjustment has to be made to them as well as to other items in the balance of payments. In addition, long-term capital movements, which are excluded from the balancing items, may themselves at times be short-term balancing items. Witness the foreign long-term borrowing which sometimes occurs when a nation's monetary authorities are faced with an actual or prospective deficit on current account.

Since we have demonstrated that the argument adduced for the view that there is a chronic shortage of dollars is not convincing, it is proper to inquire into the means by which a temporary shortage of dollars may be eliminated. Under fixed exchange rates, the conventional adjustment to a continuing excess of demand for dollars consists of the effects of balancing movements of gold and short-term capital. The effects are supposed to be rising incomes and prices in the United States. accompanied by rising imports relative to exports until the dollar shortage is removed. This process tends to be aided by the impetus to increased long-term foreign lending which results from higher income levels in the United States. This adjustment process, however, does not work well in the case of a country such as the United States. The principal reason for this is that foreign transactions are relatively unimportant in our economy. Our total foreign trade, as a small fraction of gross national income (averaging some five to eight per cent), is the lowest of any country in the world apart from India. China, and the Soviet Union. In addition, adjustment to balance-of-payments disequilibrium is retarded because the American marginal propensity to import is low. As a result, changes in the import-export relationship are seldom strong enough to affect materially our domestic national income. Basic international trade difficulties thus tend to remain uncorrected as far as the United States is concerned. On the other hand, the world's dollar position is much more powerfully affected by the level of United States business activity, since imports (the main source of dollars) are closely correlated with such domestic activity.

Foreign countries are not without a role with respect to the adjustment to a shortage of dollars. It may even be said that on paper foreign countries alone are capable of introducing the necessary corrections. This they may do through the familiar process of deflation and depression (a drop in incomes and prices induced by a loss of gold and liquid reserves to the United States), coupled with upward revision of their tariffs and the institution of exchange controls. There is no question but that such in fact was an important phase of the adjustment to the shortage of dollars in the interwar period. Clearly, however, this is a socially undesirable means of adjustment.

The question of the rate of exchange for the dollar cannot be ignored in any discussion of the dollar problem. It may well be asked why the world demand for and supply of dollars cannot be brought into equality by allowing the value of the dollar to rise—that is, by allowing foreign currencies to depreciate. If the dollar appreciates sufficiently, would the amount of dollars demanded by the world fall and the quantity supplied rise so as to restore equality? As a long-run solution, this view has some merit, but it is clearly inappropriate in the early postwar period because of the abnormal economic and political situations which will then prevail. The effectiveness of dollar appreciation as a long-run means of restoring balanceof-payments equilibrium will depend mainly upon the relevant price elasticities of demand. If both the American price elasticity of demand for foreign goods (and services) and the foreign price elasticity of demand for American goods are above unity, it is analytically possible to restore balance-of-payments equilibrium. Under these conditions, the United States would spend, as compared with formerly, more dollars in buying foreign goods and foreigners would spend less dollars in buying American merchandise.

The evidence appears to indicate that the foreign price elasticity of demand for American exports is well above unity. American import demand, however, generally is characterized by a different price-elasticity pattern. The American demand for imports as a whole, including those which are importable without payment of duty, is probably relatively low or below unity. If it is below unity, dollar appreciation will have the effect not of increasing, but of actually reducing the quantity of dollars made available to the outside world.

The question is fundamentally a statistical one. Will dollar appreciation reduce foreign demand by enough to offset the likelihood of a reduced supply of dollars? If the answer is in the affirmative, dollar appreciation is the solution to the observed world shortage of dollars. Two observations are called for however. First, the appreciation will probably have to be very large, in view of the low American price elasticity of demand. Foreigners may prefer to use exchange controls and other trading devices in order to maintain higher exchange rates, and thus to preserve better terms of trade. In the second place, the method of dollar appreciation would be contractionist and not expansionist as far as international trade is concerned. It would restore equality of supply and demand for dollars by contracting the demand in net terms. Nevertheless, the approach to the dollar problem by way of exchange appreciation must be given thorough consideration by makers of policy. Although appreciation alone is likely to prove insufficient, it would appear that a policy of appreciation plus high-level employment in the United States would correct a temporary shortage of dollars. (The reader is also referred to Chapter 32, where this topic is treated from a different angle.)

It may help if we supplement the foregoing discussion by enumerating the principal factors which worked during the interwar period to produce the observed shortage of dollars. After World War I, the United States was the leading source of supply for the equipment and materials needed to reconstruct war-torn Europe. Despite large-scale American lending, the persistent demand for American merchandise created a relative scarcity of dollars in world monetary centers. The real shortage, however, did not begin until the 1930's. A second factor was the high American tariff, which was especially important in view of the large fixed debt-service obligations to the United States. The Tariff Act of 1930 in particular, by further restricting the entry of foreign goods at a time when foreign debt-service requirements were at a maximum and new loans were coming to an end, served to intensify the dollar shortage. Thirdly, the national income of the United States in the 1930's was generally low in relation to foreign income, mainly because unemployment was greater in America. As a result, our exports fell proportionately less than our imports because the former tend to follow changes in foreign incomes whereas the latter are generally related to our industrial activity and national income. Lastly, the persecution of minorities and the revolutionary political developments of the decade induced foreigners to transfer vast quantities of wealth to other countries, particularly to the United States. The demand for our currency to satisfy these requirements came on top of other demands which already were heavily taxing the available supply of dollars. Of the four major factors enumerated above, perhaps the most important was the relatively greater unemployment which prevailed in the United States. If the United States succeeds in stabilizing employment at a high level, it will do more than anything else to assure an adequate world supply of dollar exchange.

### A Proposal Considered

Before bringing the present discussion to a close, a word should be said about a type of proposal advanced by some writers as a solution to the dollar problem. We may take as an illustration a plan proposed by a man who was for many vears an adviser to the State Department.3 According to this plan, the United States should adopt a minimum yearly budget of 3 or 4 billion dollars, to be apportioned among all foreign countries by negotiation. Such sums would then be used by the countries to make payments to the United States for goods. services, and debts. As the foreigners draw on the minimum credit assigned to them, they would credit the United States with an equivalent amount of their own currency, such amounts being computed on the basis of exchange rates mutually agreed upon. The United States, upon using such local currencies to make, let us say, foreign purchases, would pay dollars to the budget. Thus, if the United States makes payments annually to foreigners up to the equivalent of the yearly budget, the books will be clear at the end of each year. If, however, a credit balance in dollars accrues to foreigners, or in foreign currency to the United States, and such credits remained unspent after two years, the unspent sums would be canceled. There would be, in addition, a regular exchange market outside the minimum budget so as to allow transactions over and above the minimum budget or for international capital movements.

Concretely, suppose that under this plan Portugal were to have an annual minimum dollar budget of 100 million. Portugal would be able to spend up to that amount each year, payment being made by crediting the United States with its own currency, escudos. Assume that the escudo is worth 10¢, in which case we shall be credited to an equivalent amount, or one billion escudos. It is very unlikely that Portugal will turn down the opportunity to spend the full 100 million dollars each year. The United States, however, may not wish, for a variety of reasons, to purchase the equivalent value of Portuguese goods and services. Assume that we purchase only 600 million escudos' worth of goods annually for two years. At the end of this period, in accordance with the terms of the plan, 800 million escudos (80 million dollars) of United States credits will

Feis, H., "Restoring Trade after the War," Foreign Affairs, January 1942

be canceled. Portugal will have obtained goods and services from us on terms of 60¢ on the dollar. Obviously, the United States can avoid the loss involved by purchasing more Portuguese goods. Clearly then, this plan shifts the adjustment to the surplus country. Equity requires, however, that the adjustment be reciprocal.

But there are other difficulties with the proposed plan. the first place, the quantity of dollars put at the disposal of foreign countries will be determined by negotiation—that is. by the process of diplomacy and not by the objective criteria of the market. This alone is perhaps the fatal defect in the In the second place, the plan involves sheer bilateralism in that it will be necessary to balance accounts on a twocountry basis as between ourselves and all other countries. Innumerable distortions in trade relations would stem from this feature alone. Thirdly, it places the determination of exchange rates on an arbitrary basis in that the diplomatic decision with respect to the size of each foreign country's minimum dollar credit will do more than anything else to determine the appropriateness of most of the world's exchange rates. Lastly, it "solves" the dollar problem by limiting the alternatives to a forced two-way balancing of accounts or to gifts by the United States to foreign countries. There is every reason to believe that the gift method would generally prevail.

The adjustment process based on gifts would, however, only lead to still more troublesome problems. It would doubtless complicate immeasurably the diplomatic process of granting minimum credits to foreign countries, possibly leading to jealousies among the receiving countries because of alleged unfair treatment. More important, however, would be the effect of foreign gifts upon the relations between different groups in our domestic economy. Once gifts were granted to foreigners, the government would have little moral right to refuse to make gifts to pressure groups at home. Despite the fact that the American standard of living is the highest in the world, numerous public services are unsatisfactory because

inadequate funds are made available from normal sources. One need but mention public-school buildings and services, local hospitals, road building, and so on. Although it is not within the province of this book to discuss purely domestic matters, it would appear that funds could be made available for such purposes on a gift basis on far more objective terms than would be the case under the foreign-credit plan under consideration. Being purely domestic in character, there would be no adverse international effects of unwise decisions. Moreover, to the extent that high-level employment would thus be maintained in the United States, our import level would remain high and steady, and foreign countries would acquire a large volume of dollars in accordance with their dollar-earning capacity.

#### S ary

The shortage of dollars actually experienced in the 1930's was the result mainly of two circumstances: deep depression in the United States, which sharply reduced our imports, and the world political turmoil, which gave rise to the greatest flight of refugee funds on record. It has been suggested that the shortage of dollars is chronic because an increase in American imports, far from helping the foreigner, will only lead to an even greater increase in foreign imports of American goods. Upon analysis it was shown that this thesis is invalid as long as the foreign marginal propensity to save is greater than zero, as is almost always the case. We then indicated the several senses in which it is possible to speak of a temporary shortage of dollars.

With respect to the means by which a shortage of dollars can be corrected, stress was placed upon the role of American business activity. A high level of employment and income in the United States will do much to correct dollar shortages because our imports will be high, which means that foreigners will be earning large amounts of dollars. It was also pointed out that the level of the exchange rate has something to do with an ob-

served shortage of dollars and specifically that appreciation of the dollar might, under appropriate circumstances, help to correct the situation.

We also analyzed a proposal which was advanced as an easy solution of the dollar shortage. This proposal would involve giving foreigners large annual dollar-export credits repayable only in the form of imports by the United States within a period of two years. The proposal was seen to be nothing more than a way of making gifts, and as such likely to create more difficulties than it "solves."

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# Chapter 32

# The International Monetary Fund

The forty-four countries that gathered for the United Nations Monetary and Financial Conference in the little resort town of Bretton Woods, New Hampshire, in July 1944 reached two important agreements. One recommended the establishment of an International Monetary Fund and the other called for the establishment of an International Bank for Reconstruction and Development. Both agreements will be recorded in history as important milestones in international economic co-operation. Since the Fund and the Bank are distinctly different types of institutions, we shall devote separate chapters to each. The Fund and the Bank began operations in 1946. This chapter will consider the International Monetary Fund. (We shall refer to it briefly as the Fund, the capital F serving to distinguish the Bretton Woods institution from the American stabilization fund of the 1930's.)

# Background

It is helpful to consider the Fund as essentially the logical successor to the Tripartite Agreement of 1936. The reader will recall from the preceding chapter that the Tripartite Agreement implicitly called for two basic types of action as between the signatories to that Agreement. These two types of action consisted of (1) the mutual support of each other's currency and (2) the agreement to consult with other countries and possibly to obtain their consent before any one country made a decision concerning the level of its exchange rate. We know that the Tripartite Agreement actually did not work that

way during the three years of its effective operation. A mere three years during a period of turbulent international politics is too short a time to modify the role of national sovereignty with respect to the determination of the value of a country's currency. But the implicit requirements of the Tripartite Agreement, nevertheless, were elements of the historical picture in terms of which the reader should approach the Bretton Woods agreement concerning the Fund.

A second element in the historical picture was the recognition of the need to avoid a state of disorderliness in world currencies such as occurred following World War I. At that time each nation made its own independent decision about the relationship of its currency to those of other nations. Although each nation had departed from the international gold standard during the war, and although the nations emerged from the war with price levels, gold reserves, and foreign investments which bore very different relationships to each other as compared with 1914, little was done to secure effective action in the international monetary field. For example, the British allowed the pound sterling to wobble until 1925, and the French franc wobbled for almost two more years. Finally, when the British returned to the gold standard in 1925, they erred seriously by returning to that standard on the basis of the 1914 gold content for sterling. This parity of exchange seriously overvalued the currency. British prices were too high relative to prices and incomes elsewhere, and as a result, her export industries remained depressed through the late 1920's, when the rest of the world was enjoying prosperity. Although the stickiness of British costs and wages was generally known, the prevailing ideas about international money placed preponderant emphasis upon rigid exchange stability. There was at this time no international mechanism by means of which orderly changes in the value of any one nation's currency could be effected. In consequence, the exchange stability that obtained was a brittle stability, one that was likely to

lead to collapse, as is well illustrated by the fall of sterling in 1931.

The third and most important element in the historical picture was the recognition of the folly of the beggar-thy-neighbor exchange practices of the 1930's. One need only recall the multiple-currency practices, the clearing arrangements, and the host of other discriminatory devices used with particular destructiveness by the European countries. Had an international organization, equipped to deal with these problems, existed during this period, a much happier situation would have prevailed.

## Purposes of the Fund

In the light of the foregoing, what are the purposes of the International Monetary Fund? As stated in the Articles of Agreement of the Fund, they are as follows:

1. To promote international monetary co-operation through a permanent institution which provides the machinery for consultation and collaboration on international monetary problems.

2. To facilitate the expansion and balanced growth of international trade and thereby help to promote and maintain high levels of employment and real income.

3. To promote exchange stability, to maintain orderly exchange arrangements among members, and to avoid competitive exchange depreciation.

4. To assist in the establishment of a multilateral system of payments in respect to current transactions—that is, in respect to current exports and imports of goods and services.

5. To give confidence to member countries by making the Fund's resources available to them under adequate safeguards, thus providing them with opportunity to correct maladjustments in their balance of payments without resorting to measures destructive of national or international prosperity.

6. In accordance with the above, to shorten the duration and

lessen the degree of disaquilibrium in the international balances of payments of members.

### Structure and Organization

Membership in the Fund is open to the forty-four United Nations (the original members) which were present at the Bretton Woods conference, and other countries may be admitted at the discretion of the Fund. Each member appoints one governor to the Board of Governors, the top organization. Below the Board of Governors in the hierarchy is the real day-to-day management, known as the Executive Directors of the Fund. There must be at least twelve directors. The five largest contributing members each appoint a director; two directors are elected by the Latin American Republics as a group; and the remaining five are elected by the other countries. The executive offices of the Fund are located in the United States because hers is the largest contribution to the Fund.

The Fund consists of a pool of gold and foreign exchange totaling 8.8 billion dollars which has been contributed by member countries. Each country has a quota which is equal to its contribution. A quota is the total value of the foreign exchange which any member will be able to use, under prescribed conditions, in support of the value of its currency. For example, the quota of France is 450 million dollars, that of Cuba is 50 million dollars, and that of the United States is 2,750 million dollars. (For details, see page 720, Appendix B.)

Voting power is distributed as follows: Each country has 250 votes plus one vote for each \$100,000.00 of its quota. To illustrate, the United States has 250 votes plus 27,500 (since its quota totals 2,750 million dollars). In addition, the Fund provides that countries will lose votes in proportion to the net use which they make of foreign exchange in the pool. A debtor to the Fund loses some votes. The reverse happens in the case of a country whose currency is being borrowed or used by a member. The relevant provision is as follows: A member will

receive one additional vote for each \$400,000.00 of its currency which is being used (net) by other members, but the other members will lose one vote for each \$400,000.00 of pooled exchange which they borrow (net) from the Fund. (If the voting arrangement appears to be needlessly complicated, it may be pointed out that it represents a process of juggling which was designed to insure that particular countries or groups of countries would stand in a preconceived relationship to one another.) Voting will not be by countries individually, but through the Executive Directors. Each director will vote the block of votes that he controls. We shall discuss below the manner in which voting takes place in connection with particular issues.

#### What the Fund Does

We turn now to a consideration of the Fund as a mechanism for accomplishing the purposes mentioned above. First and foremost, the Fund is an international institution through which nations will consult regarding all major international monetary problems. The consultation will be on the basis of full disclosure of relevant monetary information and continuous study by trained persons. Gone will be the days when nations will make essentially international decisions unilaterally, without prior consultation and without attempting to submit to agreed rules of international monetary conduct. Given the Fund's emphasis upon growth of trade and steadily improving material well-being among nations, the element of consultation should make for healthier international economic relations. Corrective action, when needed, is likely to take place in the early stages of trouble, and nations will be able to view the outcome with greater confidence.

The keynote of the Fund is exchange-rate stability with flexibility. In contrast, the old gold standard may be described as one which calls for exchange-rate stability at all costs. To be sure, the gold standard is premised upon a high degree of fluidity or adaptability of domestic costs and prices.

and under such conditions, exchange-rate stability need not involve any costs in the sense used in the preceding sentence But modern national economies under familiar money and credit arrangements are not characterized by a high degree of factor and cost adaptability; movements of the factors of production do not respond quickly and costlessly to shifts of demand: and prices do not always move in harmony with changes in the underlying conditions of supply and demand To a great extent, costs and prices are sticky in the modern economy. Social policies of today, as generally implemented make anything but stickiness difficult of achievement. In this context, therefore, gold-standard rules would only produce a situation of the sort which results when an irresistible force meets an immovable object. The purpose of the Fund, on the other hand, is to offer temporary exchange support and to allow exchange-rate adjustments to take place when needed, so as not to jeopardize the maintenance of domestic employment and income.

Exchange-rate stability with flexibility is achieved basically because repayable financial support, the amount and conditions of use of which are fully known in advance, is granted and because exchange-rate changes are permitted when necessary. Let us consider these two basic elements in turn.

Financial support under the Fund takes the form of a claim which each member has upon a common pool of gold and currencies. This claim is technically known as a quota. Collectively, the forty-four member nations have quotas aggregating 8.8 billion dollars. This is the size of the common pool of gold and currencies, and is built up as follows: Each country contributes gold to the extent of 25 per cent of its quota or 10 per cent of its net official holdings of gold and dollars, whichever is lower. The remainder of the quota is payable in the paper currency of each country. From this common pool of gold and currencies, each country is entitled to draw up to 25 per cent of its quota in any one year, provided that such action is consistent with the purposes of the Fund. When members

use their quota, the process involved is not the same as that which occurs when a person draws a check against his bank. Rather, the member country must buy other currency from the Fund by crediting the Fund with an equivalent amount of its own currency. The Fund is thus well protected. For example, if Country X is allowed to draw the full 25 per cent of its quota in the first year, the Fund will have 500 per cent collateral—that is, the original quota of gold and currency plus 25 per cent additional currency pledged as security against the use of 25 per cent of the quota. When a country has borrowed up to the limit of its quota, the Fund will have collateral equal to twice the gold value of currencies which have been purchased from it by the member in question.

The right to draw on the Fund and the proviso that such borrowing must be consistent with the purposes of the Fund are both important. Having this conditional right, member countries can rely on a steadier supply of foreign exchange than they otherwise could count on. Take the case of a financially weak agricultural country that is exposed to important crop failures from time to time. Without assistance of the type obtained under the Fund, such a country would either have to borrow abroad in order to maintain its rate of imports or it would have to let its currency depreciate (and thus allow the local cost of imports to rise) or it would have to ration the available (smaller) supply of foreign exchange by means of some form of exchange control. All these alternatives may be regarded as unsatisfactory by the country in question. Under the Fund, however, it knows precisely and in advance how much stop-gap assistance it can avail itself of in any one year, and it knows in advance what this assistance will cost. For instance, if the country draws upon the Fund (purchases foreign currencies by depositing an equivalent amount of its own currency) up to one quarter of its quota and expects to repay (repurchase its own currency) in just under a year, it knows that the assistance will cost the standard service charge of 34 per cent payable by all countries using the Fund's resources

plus % per cent for the use of the credit up to one year, or a total of 1½ per cent. It knows, in other words, that the cost will be low, and it knows this cost in advance. What is more, in contrast to a formal loan, the credit is not repayable at any specific time (instead, the charges rise both in terms of the amount of the credit and the length of time that the credit has been due). Even financially strong countries will benefit in the same general way from this feature of the Fund, for such countries are not immune to balance-of-payments difficulties.

Member countries, however, do not have an unqualified right to use the Fund's resources. They have this right only if the use is consistent with the purposes of the Fund. In fact, we may say that the Fund is equipped with a series of automatic and discretionary controls especially designed to prevent undue use of its resources by any member country.

Consider, for example, the following important automatic controls: First, definite limits are established with respect to the amount of foreign exchange a member may obtain from the Fund in any one year or as a maximum over a period of years unless the Fund grants special permission to exceed these limits. Secondly, a small service charge of 3/2 per cent must be paid on all foreign exchange purchased from the Fund. This service charge was deliberately made higher than the cost of shipping gold in normal times (approximately 1/2 per cent) in order to encourage members to use their own gold resources instead of borrowing from the Fund. Thirdly, an annual charge is levied on a country that has borrowed from the Fund. This charge increases (1) the larger the use of the Fund's resources and (2) the longer the period over which the resources are used by the country in question. By this means, rising pressure is put on a member country to reduce its use of the Fund. In the fourth place, countries have an obligation to repurchase their own currencies from the Fund with gold or foreign exchange. This obligation is rather technical, and the

There will be no charge for the first three months, but a charge of ½ per cent for the next nine months. There will thus be a net charge of ¾ per cent for the year.

reader is advised to consult the language of the Fund itself (p. 708 in the Appendix). Briefly, the repurchase obligation requires countries that are gaining gold and foreign exchange to use half of the amounts gained to reduce the total of their own currency which previously had been deposited with the Fund in connection with the purchase of other currencies.

The discretionary controls are even more powerful than the automatic controls. In the first place, once the Fund has commenced general exchange operations it can deny the use of its resources to a country when it is satisfied that that country is not making appropriate use of its assistance. Thus, if a country is experiencing balance-of-payments difficulty by reason of the fact that it is importing on a large scale in order to carry on war against its neighbor, the Fund will refuse to allow its resources to be used for such a purpose. Secondly, there is discretionary power to ensure that countries drawing upon the Fund's resources will use the breathing spell thus acquired to correct their balance-of-payments position. The Fund is to be used to help countries meet temporary deficits only and to give them time to correct deep-seated maladjustments.

Let us next consider the case of a country that has made use of the Fund's resources to a certain extent, but still finds itself faced with an adverse balance of payments. Perhaps its exchange rate is overvalued. If it judges such to be the case and has a reasonable defense of its action, the country itself is free, under the provisions of the Fund, to depreciate its currency up to 10 per cent. It need not seek the Fund's permission for a change up to this amount. If the disequilibrium still persisted, however, it could not take further action with respect to its exchange rate. Instead, it would carry its case to the Executive Directors of the Fund, who would have already completed various statistical studies concerning the country's changing position. After careful survey, the Fund authorities would decide whether further depreciation of the country's currency is desirable. If further depreciation is deemed desirable, an orderly transition to a new level of its exchange rate would be facilitated. Competitive currency depreciation is thereby avoided. Depreciation is permitted instead only to correct what is officially termed a fundamental disequilibrium. For the time being, we defer consideration of this concept, but it is important to note that permitted depreciation will not be stow competitive advantages on particular countries. Rather if the depreciation is based upon a correct appraisal by the Fund, it will serve only to offset a deterioration which had previously set in. In other words, if, for example, the price of New Zealand butter (which we will regard as synonymous with exports) had increased by 10 per cent because, let us say, social insurance and related costs had increased to a point necessitating such an increase in price. New Zealand would be permitted to depreciate its currency (after the initial 10 per cent) only to the extent necessary to make New Zealand butter in foreign markets just as attractive, pricewise, relative to other butters, as was the case before New Zealand's costs had risen.

But it may be remarked, this action will cause the Fund's holdings of New Zealand currency to fall in value. Actually this is not the case. There is a provision in the Fund whereby members are protected against New Zealand depreciation. The country that depreciates its currency must restore the previous gold value of its contribution to the Fund by making up the difference. New Zealand, in the present case, would have to deposit enough additional New Zealand paper pounds with the Fund to maintain an unchanged gold value of its currency.

It may also be asked whether, under the Fund, New Zealand must correct a condition of disequilibrium by way of depreciation. Adjustment in this form is not required. New Zealand is free to choose the hard way, namely, that of deflation. But such a course would involve a greater reduction in the real income of its people, and generally would be politically undesirable.

There is one outstanding exception to the above rules about currency depreciation (or appreciation). This exception has to do with the peculiar position vis-q-vis the Fund that characterizes state-trading countries such as Russia. As the reader will recall from the chapter on state trading, a government foreign-trade monopoly under a planned economy conducts its activities not according to price considerations as such but in terms of detailed plans. A planned economy does not have to conform to conditions found under a system of competitive nrices: internal prices may be set so as to conform to costs in some cases and not in others. Some internal prices may contain elements of taxation; others may involve subsidization. Moreover, since 1931, Russian international trade has been conducted not in terms of Soviet currency, the ruble, but in foreign exchange. The state foreign-trade monopoly will buy in terms of dollars, francs, and so on, and will sell in terms of these same currencies. In consequence, the exchange rate for the ruble is purely nominal. Because of these peculiarities, the Fund provides that "a member may change the par value of its currency without the concurrence of the Fund if the change does not affect the international transactions of members of the Fund." When considered by itself, there is nothing strange about this provision. When, however, it is considered in relation to the size of country quotas, the unbiased observer is troubled. The quotas are designed primarily to enable countries to support their exchange rate during brief periods of disequilibrium, but Russia's problem is admittedly of a different order. Why, then, was the Soviet Union granted the third largest quota, totaling 1.2 billion dollars? The answer is probably to be found in diplomatic bargaining; at any rate, the issue is still essentially academic because Russia has not formally joined the Fund.

Also included among the important provisions of the Fund is the express power granted members to control capital movements. In view of the numerous occasions on which this book has touched upon the disturbances caused by (short-term or flight) capital movements in the past, it is not surprising that the Fund grants each country the right to control such move-

ments. Even without the Fund, however, it is certain that countries would no longer allow the mass movements of refugee funds such as occurred in the 1930's. It will be recalled from the chapter on balance-of-payments analysis, for example, that to a considerable degree the scarcity of dollars during the 1930's resulted from the perverse movement of capital to the United States.

Another consideration in this connection relates to the so-called scarce-currency provisions. The experience of the 1930's has taught the world to be suspicious of United States economic policy, particularly as concerns the supply of dollars made available by our imports of goods and services and by our lending. This general suspicion was taken into account at the Bretton Woods conference. An important set of provisions deals with scarce currencies. Thus, if the Fund finds there is a general scarcity of any one currency, so that its ability to supply such currency is threatened, it shall formally declare such currency to be scarce. It shall also apportion the currency among member countries. A formal declaration of scarcity also entitles any member, after consultation with the Fund, temporarily to impose any form of exchange control which it wishes as regards the use of such currency. The exchange control must be terminated, however, as soon as the Fund declares the currency in question to be no longer scarce. This provision of the Fund, therefore, sanctions the use of discriminating exchange control as long as a particular currency is declared to be scarce.

One final matter has to do with the major voting provisions. These will be considered in relation to (1) the par value of currencies and (2) the size of quotas. With respect to the par value of currencies, there is a distinction between particular and uniform proportionate changes in the par values of the currencies of all members. Particular changes in par value relate to the depreciation features discussed above, and do not involve problems of voting: the matter rests simply between the member country and the Executive Directors of the Fund.

In the case of uniform proportionate changes in par values. however, voting is involved. (The voting power of members. as we have seen, is proportionate to their quotas.) Such a change in par values requires a majority of the total voting power, provided that each such change is approved by every member having 10 per cent or more of the total of the quotas. As the quotas now stand, the specific approval of the United States, Britain, and Russia, the only countries having 10 per cent of the total vote, would be required to effect a uniform proportionate change in all par values. It will, of course, be appreciated that a uniform proportionate change would leave all currencies in an unchanged relative position. The only effect of such action would be to enable any given volume of gold to do more or less work than was done before, or stated differently, it would be a means of reducing or increasing the real value of gold in the very same way that the United States increased the real value of gold when it raised the buying price from \$20.67 to \$35.00 per ounce in 1933-34.

The size of quotas is another matter involving voting by members. Raising or lowering the size of a country's quota means two things: From the point of view of countries with weak balances of payments, it means increasing or reducing the extent of assistance that that country is entitled to receive from the Fund. It also means that the contribution of countries with strong balances of payments can be increased or reduced. Countries that feel that they will be in need of assistance more often than not may from time to time take the position that their quotas should be enlarged, whereas countries in the reverse position are likely to oppose changing the size of quotas. Creditor countries such as the United States will not want to have their contribution to the Fund changed from time to time by countries with weak balances of payments (who have over a majority of the total voting power). For these reasons, a large vote is required to change the size of quotas. A four-fifths majority and the consent of the member whose quota is to be changed are required. Since the United

States is the only country that has over 20 per cent of the total vote, this provision means that the United States has veto power over changes in the size of country quotas.

# The Concept of "Fundamental Disequilibrium"

The concept of fundamental disequilibrium is of importance in the International Monetary Fund because Article IV, Sec. 5 (a) of its provisions states that a country shall not propose a depreciation of its currency "except to correct a fundamental disequilibrium." This concept, however, is not defined in the Fund agreement, thus leaving the question to the judgment of the Executive Directors of the Fund. What is more, if the Fund is satisfied that something on the order of a fundamental disequilibrium exists, it cannot base any of its actions on disapproval of "the domestic social or political policies of the member" country (Article IV, Sec. 5 (f)).

It will be helpful in approaching this problem to eliminate one element that is ruled out by the terms of the Fund itself and to consider the economist's definition of disequilibrium. With respect to the former, it may be said that fundamental disequilibrium cannot be due to the loss of gold and/or foreignexchange reserves because of capital exports. This is so because the Fund expressly permits the use of exchange control to prevent capital movements. But capital movements are of two distinctly different types: short-term and long-term movements. For all practical purposes, however, exchange control will be restricted under the Fund to short-term capital movements. We are thus left with current-account transactions plus long-term capital movements, the very section of the balance of payments in terms of which the economist defines equilibrium and disequilibrium. To the economist, the standard case of fundamental disequilibrium is one in which there is a large and continued loss of gold and foreign-exchange reserves due to a persistent deficit in the balance of payments on current account not offset by long-term capital movements. Unfortunately for those who seek simple explanations, however, the standard case of disequilibrium assumes a state of full employment (1) in the country whose exchange-rate situation is under consideration and (2) in the outside world. To state the same facts differently, the standard case of exchange-rate equilibrium (the equilibrium rate of exchange) is defined in terms of equilibrium in the balance of payments. But equilibrium in the balance of payments can exist at several different exchange rates, depending on the level of employment. That is to say, equilibrium in the balance of payments which is achieved under full employment at one exchange rate might also be achieved at a different exchange rate if the level of employment and income falls to such an extent that the resultant contraction in purchases of goods and services including foreign goods and services-keeps the country's outpayments in line with its receipts, including long-term capital. "Fundamental disequilibrium" cannot, therefore, be approached solely in terms of equilibrium or disequilibrium in the balance of payments.

Although the decision with respect to "fundamental disequilibrium" rests with the managers of the Fund, it seems that two objective criteria will provide the basis for their decision. (First and foremost, is one country or a small group of countries in a badly depressed state of business at the same time that the rest of the world is prosperous? The second criterion would be: Does the country (or do the countries) in question have an actual deficit in the balance of payments? If the answers to both questions are in the affirmative, it would be reasonably certain that the case (or cases) would fall into the category of "fundamental disequilibrium." <sup>2</sup>) The country

The two criteria referred to above are incorporated in the following query put to the Executive Directors of the Fund by the late Lord Keynes in behalf

<sup>&</sup>lt;sup>2</sup>The position taken in the text is similar to the general conclusion reached by a well-known specialist in this field. See Haberler, G., "Currency Depreciation and the International Monetary Fund," Review of Economic Statistics, Vol XXVL, No. 4, November 1944, p. 180 In contrast to Haberler, and the writer in the same journal proposes that the vague notion of cost-structure parity be used to determine fundamental disequilibrium. See Hansen, A. H., "A Brief Note on Fundamental Disequilibrium," bid., p. 184.

would then be permitted to depreciate its exchange rate to the extent needed to help restore its position to one of approximate equality of prosperity with the rest of the world.

What happens, however, when one country alone is in a depressed state of business but is not experiencing a deficit in its balance of payments? In such a case, business depression does not result from pressure on its balance of payments. Rather, the fall of imports relative to exports, which can be traced to the decline in domestic business, is likely to improve this country's balance of payments. This country will then be accumulating claims on the rest of the world, or, stated differently, most nations will be going into short-term debt to the depressed country. This means that the latter country is failing to keep the world adequately supplied with its own currency because of (1) low current imports of goods and services and/or (2) insufficient long-term foreign investment. The Fund is also equipped to handle this type of situation, as will now be explained.

### "Scarce" Currencies and the Fund

The "scarce-currency" provisions of the International Monetary Fund constitute another important part of the machinery with which we are concerned. To be declared a scarce currency, a particular country's money must be in general "scarcity"; that is, it must be found that many countries are short of the currency in question. (If only one or two countries are short of the particular currency, it will be because they themselves are probably in a state of "fundamental disequilibrium" and so will seek to depreciate their own currency, as explained above.) In order that a sense of perspective may be maintained, it may be helpful to indicate briefly, before we proceed further, (1) how countries would restrict the demand for scarce

of the British. Keynes asked whether "steps necessary to protect a member from unemployment of a chronic or persistent character, arising from pressure on its balance of payments, shall be measures necessary to correct a fundamental disequilibrium." New York Times, March 19, 1916. The Fund authorities ruled in the affirmative, but with reservations.

currencies if there were no Fund, and (2) the history of currency scarcity.

In the absence of the Fund, countries would doubtless employ the same exchange-control and clearing techniques that were used in the 1930's. And without doubt countries would employ these techniques with greater ingenuity and with greater severity. In addition, it is reasonable to believe that they would declare moratoria on the transfer of earnings from foreign investments, debt payments, and so forth. The Fund does not, therefore, grant powers to countries which would not otherwise be employed. Rather, it merely regularizes the employment of such powers, making their use and the termination of their use subject to definite international rules.

And what about the history of currency scarcity? The evidence is clear on this point. Before the 1930's, there is no record to indicate that a major currency had been scarce, in the sense in which moderns employ the term, except during periods of war. In the 1930's the principal currency scarcity, that of the United States dollar, was the result mainly of (1) the perverse movement of huge amounts of capital to the United States and (2) the deep depression in the United States (which drastically curtailed the supply of dollars by way of sharply reducing the volume of American imports).

Let us now return to a consideration of the factors that are relevant to the Fund's scarce-currency provisions. In the first place, what kind of a country can be responsible for a scarcity of its currency? Can Honduras cause a scarcity of its currency as much as the United States? It clearly cannot. If Honduras' imports fell by 100 per cent—that is, to zero, other nations would hardly know that anything had changed. Even if the world used Honduran currency, which it does not (her imports are billed in other currencies, usually the dollar), Honduran imports are so small that changes in their level would represent no material decline in purchasing power possessed by other countries. It is otherwise with a country such as the

United States. Our imports and our lending normally are large, and foreign payments in dollars normally are large. Should a sharp drop occur in the volume of our imports or in our foreign lending, foreigners' dollar receipts would fall by a large amount, and the decline would prove very embarrassing to them. Stated differently, only a large nation such as the United States can have a surplus in its balance of payments large enough to cause a scarcity of its currency. Secondly, it should be noted that a large drop in our imports or foreign lending would probably be associated with depression in the United States. We are ourselves as much opposed to domestic economic depression as the rest of the world is opposed to suffering the consequences of a widely fluctuating supply of dollars, such as occurs when depression begets dollar scarcity. In the third place, the Fund does not deal with a scarce currency by requiring that the world reduce its payments to countries other than the one whose currency is scarce. quire such a step would be to shift the burden of adjustment to other countries. The other countries would find that their exports of goods and services would suffer whereas the country with the scarce currency would be enabled to continue its exports on a relatively unchanged basis. The scarce-currency country should not get off so lightly.

The Fund, therefore, provides measures to cope with currency scarcity in such a way that the burden of adjustment is not borne mainly by countries other than the scarce-currency country. As was stated earlier, general scarcity exists when many countries are short of an important currency—that is, when there are large and persistent deficits in the accounts of many countries with the scarce-currency country (which has the large favorable balance of payments). The Fund determines general scarcity by ascertaining (1) the size of the favorable balance of payments, (2) the number of countries experiencing deficits in payments to the country having the favorable balance of payments, and (3) the length of time that deficits have been sustained. A currency will not be declared

to be scarce unless the favorable-balance of payments is large and the deficits pervasive and persistent. When the currency of the country in question is declared to be scarce, any country (not only those experiencing deficits in their balances of payments) is entitled, after consultation with the Fund, to impose any restrictions it sees fit on the making of payments and transfers for current-account transactions in that currency. Most countries are likely to impose exchange-control restrictions on the use of the currency in question. As soon as the scarcity is declared to be at an end, however, countries must terminate their restrictions on the use of the currency, and must then restore freedom of payments for current-account transactions. One of the prime purposes of the Fund, it will be recalled, is to establish and maintain a multilateral system of payments in respect to current-account transactions.

The Fund will also be in a position to augment the supply of the currency which is found to be in general scarcity. It may do so (1) by arranging, with the consent of the country in question, to borrow the currency that is scarce or (2) by requiring the scarce-currency country to sell its currency to the Fund for gold.

# Adjustment via Depreciation

Since the Fund is designed primarily to secure orderly adjustments in exchange rates, it is appropriate that we undertake a brief discussion of the results which are obtained when a country depreciates its currency. When a country is unable to attract long-term capital and is faced with a current-account deficit, what are the conditions under which exchange depreciation will serve to reduce or eliminate the deficit? Depreciation makes a country's exports cheaper to foreigners while increasing the price of its own imports. Will exchange depreciation increase the country's receipts relatively to its payments sufficiently to restore balance? The answer depends on the respective elasticities of demand for exports and for imports. It is necessary that the quantity of exports rise suffi-

ciently, as a result of the lower foreign price traceable to the depreciation, to more than offset the decline in price. In other words, the elasticity of demand for exports must be greater than unity. If the elasticity of demand for exports is less than unity, the value of exports will fall, and the current-account deficit will be greater than ever. Similarly, if the demand for imports is very inelastic, there will be no reduction in the value of imports consequent upon depreciation, and the situation will only be worse because of the change in the value of the currency. We conclude, therefore, that it is only when the elasticity of demand for exports and imports are both above unity that exchange depreciation will in and of itself tend to correct an adverse balance of payments on current account.

As a general rule, the efficacy of exchange depreciation as an adjustment device varies with the volume of international trade. When the volume is small, depreciation usually spends itself by turning the terms of trade against the country, and so has only a small effect on the balance of payments. When, however, the volume of international trade is large, adjustment is easier to accomplish by way of exchange depreciation. The price elasticity of demand for exports is greater than when the volume of international trade is small, and foreign demands are more sensitive to changes in exchange rates.

### The Transition Period

All of the fine purposes of the Fund are not to be accomplished as soon as the institution is duly established in 1946. As a result of the devastation of World War II and the great shifts of economic and financial strength which have stemmed from the war, a period of recuperation and adjustment will be necessary. This is officially called the transition period, and will generally be of three to five years' duration. The most important feature of the transition-period provisions is that members may impose restrictions on payments and transfers for current-account transactions notwithstanding any other provisions of the Fund. But the members, in exercising this

power, must have continuous regard to the purposes of the Fund, and specifically they must terminate current-account restrictions as soon as they can do so without subjecting themselves to new balance-of-payments difficulties.

The transition-period provisions also cover the treatment to be accorded international indebtedness arising out of the war. Specifically, these provisions insure that the resources of the Fund will not be used to pay off debts arising out of World War II. Most of the war debts of significance, from the point of view of the Fund, are short-term sterling debts, representing obligations incurred by England. As a total, the sterling debts exceed the size of the Fund, so it is not difficult to see why such indebtedness is to be handled outside such a framework. In all likelihood, such short-term indebtedness will be funded into long-term debts requiring relatively small annual payments by Britain on interest and amortization account.

One further point about the transition period is that the period will not terminate automatically at the end of five years. The member country itself, and not the Fund, is to be the judge of whether the conditions are appropriate for relaxing its exchange-control restrictions. Exchange control, as we have seen in earlier chapters, tends to create vested interests of its own, as does the tariff. During the five years following the war, a network of discriminatory trade and currency practices will have been established, which it may prove difficult to remove. In addition, the world will have to deal with the state-controlled economy of the Soviet Union and possibly other countries. In the face of all of these restrictions, there will have to be a widespread and powerful belief in the advantages of a system of multilateral-trade and free-exchange dealings if the fine purposes of the Fund are to be realized.

# The Fund in a Broader Framework

Although the Fund as a document represents a signal achievement in the field of international monetary co-operation, it should not be assumed that it is much more than the

beginning of a program3 for international economic co-operation after World War II. To appreciate that there are other important aspects of the program, the reader needs only to consider the so-called dollar problem, especially in the light of revolutionary changes in the international financial position of countries like Great Britain. Now, what is the solution to the dollar problem? It has two features, as the reader will recall from the discussion in Chapter 3. First, a large supply of dollars must be made available to the world by wav of imports and foreign lending. Secondly, even more important is the need for practical assurance that, as far as possible. the United States will not allow that supply to undergo the sharp and drastic declines that characterized the interwar period. These two points reduce themselves to one: we must avoid large-scale business slumps.

The Fund, however, does not establish a mechanism to solve the dollar problem. It does not insure that the United States will succeed in preserving high-level employment and income. The Fund has nothing to do, moreover, with such important matters as the reduction of our tariff barriers and the subsidization of our exports and our merchant marine.4 Since these are the elements of the solution of the dollar problem, and since they are not (and should not be) taken care of by the

As was pointed out in an earlier chapter, we must not allow the size of our merchant marine to fall below the level necessary for national defense, the dollar problem notwithstanding.

<sup>&</sup>quot;It is important to note that the various countries were by no means uniformly enthusiastic about the Fund or the Bretton Woods agreements. These agreements, which were reached in July 1944, were formally ratified about a year later by the United States Congress. After heated debate and the promise or near-promise of substantial American loans, the governments of Great Britain and France also ratified the agreements, but only a few days before the deadline of December 1945. The Soviet Union, one of the signatories at Bretton Woods, did not deem it important to ratify the agreements. It was generally expected that few countries would ratify the agreements prior to the acceptance of the latter by Congress, in view of the fact that the Fund without dollars would be an exceedingly weak institution. But many observers were surprised that most of the other major countries ratified the agreements only after considerable delay or because of special inducements. These facts provide important background information concerning the Fund.

Fund, there is no assurance that in the long run countries will be able to abide by the commitments under the Fund. In other words, there is no assurance that in the long run countries will be able to remove exchange controls over current-account transactions and to outlaw discriminatory currency arrangements and multiple-currency practices. (It is not intended to suggest that the United States will be solely or even mainly responsible for the successful operation of the Fund. Other countries will also have important responsibilities.)

The Fund permits exchange controls and discriminatory exchange practices during the transition period. Therefore, unless domestic employment in countries such as the United States is maintained at a high level throughout this period and thereafter, and unless trade barriers and subsidies are tempered, the world may be reluctant to honor the commitments made under the Fund. It must not be forgotten that trade channels, once established, are hard to remold, and that vested interests which grow up behind exchange controls are difficult to remove. Already there has developed a network of special postwar-payments agreements and other bilateral trade arrangements of an ostensibly temporary sort, as was shown in Chapter 29.

Great Britain, for example, is protecting her position in the difficult transition period by elaborate bilateral agreements with her Dominions and with such countries as Sweden, Belgium, Denmark, and France. These agreements also lay the basis, in the event of inappropriate American policies, for a trading area divorced, as far as possible, from the vicissitudes of American economic life and policies. Other countries are likely to follow a similar pattern of control. The projection of these developments into the none-too-distant future is a distinct possibility. But it may come to pass, not because the Fund is itself a mechanism incapable of doing the limited job assigned to it, but because the necessary complementary measures were not taken, or if taken, were not carried far enough.

#### Summary

The representatives of forty-four nations at the Bretton Woods International Monetary Conference of 1944 agreed upon the International Monetary Fund as a device for coping with the complicated technical problems involved in international financial and monetary relationships. Historically, the essence of the Fund was implicit in the exchange-stabilization agreements of the 1930's and particularly in the Tripartite Agreement of 1936. Had the latter been able to reach full development, there is every reason to believe that the signatory countries would have agreed to a policy of (1) mutual currency support and (2) consultation prior to the revision of exchange rates by individual countries. World War II intervened, however. The Fund also represents a desire to avoid a repetition of the disorderliness of world currencies which followed World War I, and to eliminate the beggar-thy-neighbor policies of the 1930's.

Although the purposes of the Fund are implicit in the statements of the preceding paragraph, the Articles of Agreement set forth several general objectives in more significant terms. The purposes are (1) to promote international monetary cooperation and consultation, (2) to facilitate the balanced growth of international trade, (3) to avoid competitive currency depreciation, (4) to assist in the re-establishment of a multilateral system of payments on current-account transactions, and (5) to provide resources which members can use to tide them over brief periods of maladjustments in their balances of payments. An elaborate machinery, consisting of monetary quotas, controls over capital, rules concerning the adjustment of exchange rates and the treatment of scarce currencies, and voting procedures, is established to help the members as a group to realize the purposes of the Fund.

Exchange rates are to be maintained relatively stable, changes being permitted when necessary to correct what is called fundamental disequilibrium. The latter concept is left undefined in the Articles of Agreement; consequently.

the managers of the Fund will have the responsibility of deciding what is meant by the term under different circumstances. As economists use the term, however, it means that a country is suffering from especially severe depression and from a large and continued loss of gold and exchange reserves due to a persistent deficit in the balance of payments, the latter term being taken as comprising the current account and the long-term capital account. Two objective criteria may be invoked: Is the country (or small group of countries) badly depressed at a time of general world prosperity? Does the country have an actual deficit in its balance of payments? If the answers are in the affirmative, the country should be permitted to depreciate its currency.

The scarce-currency provisions of the Fund constitute another important feature of the arrangement. We saw that only a large country that is important as a trader and lender can be responsible for the scarcity of its currency. Once the currency of a particular country has been declared by the Fund to be scarce, all member countries are permitted, after consulting with the Fund, to use exchange-control restrictions on current-account transactions in that currency. This means that the Fund officially sanctions discrimination in such cases for as long as the condition of scarcity exists. Thereafter, members are obligated to provide multilateral convertibility of currencies with respect to current-account transactions.

During the transition period, moreover, world economic affairs are expected to be so disordered that countries are permitted to employ exchange restrictions of the same sort that are allowed when there is a general scarcity of a particular currency. In the exercise of such restrictions, however, member countries are to have continuous regard for the purposes of the Fund; this means that controls may not be imposed by a particular country on current-account transactions if the country in question finds itself in a sound balance-of-payments position, regardless of the fact that most other countries are faced with weak balances of payments.

The machinery established under the Fund should be adequate to the task if appropriate complementary measures are taken by member countries, and particularly by the leading industrial countries. Foremost is the need for the maintenance of high-level employment and income. Furthermore, trade barriers must be reduced; preferential and discriminatory schemes eliminated; export subsidies eschewed, especially by creditor countries; and appropriate lending policies pursued. A particularly heavy burden will fall upon the United States because of the vital importance of a steady supply of dollars. Happily, the dollar question is likely to be taken care of merely as an incidental feature of a domestic high-level employment policy.

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## Chapter 33

# International Investment

A LITHOUGH the need for international investment is steady and persistent owing to the relatively backward character of many of the economies of the world, foreign lending, as we know it, characteristically has proceeded in jerky fashion. From the point of view of the world as a whole, what is needed is stable international investment at a higher level than has been common in prosperous periods of the past. In the international sphere, stability of investment at a high level is comparable in importance to stability of employment at a high level in the domestic sphere.

## Borrowing-and-Lending Stages

In discussing the subject of international investment, it is helpful to make clear at the outset what is meant by a creditor (or debtor) status on international account. A survey of discussion in this field shows that there is frequent confusion over the meaning of this status. Thus, it is common to find writers identifying a country's debtor-creditor position with the borrowing-and-lending stages through which it tends to pass in its evolution toward financial maturity. The correct statement of a country's international debtor-creditor status, however, must be in terms of its international assets and liabilities at any moment of time. Misleading and irrelevant are such matters as the condition of its balance of payments on current account or its position as a net lender or net borrower in the current year. In short, a creditor country is one whose foreign long- and short-term investments exceed its foreign

long- and short-term liabilities; a debtor country is one in which the investment-liability relation is reversed.

The points just made will be clarified if we consider the borrowing-and-lending stages through which a country tends to pass in its international financial evolution. The customary classification of stages is in terms of five analytically distinct periods or sequences in the evolutionary process.

The first stage is one in which the country is a net long-term importer of capital. (Net here means gross imports of longterm capital less (a) gross foreign long-term lending and (b) sinking-fund and redemption operations.) The country in this stage is generally an economically young and undeveloped region, requiring capital in the form of steel rails, locomotives, public-utility plant and equipment, machinery of different kinds, and so on. It obtains such capital equipment in the form of imports, some of which it pays for by borrowing from (that is, selling bonds to) savers in more developed countries. The balance will represent plants which have been constructed by foreign corporations. Our young country thus has to make financial payments in the form of interest and dividends on current account to foreign bondholders or capitalists. Interest and sinking-fund payments on the bonded debt may amount to seven to 10 per cent, whereas the percentage equivalent of the dividend payments may be about six to eight if the investment is successful. In other words, the young borrowing country receives big blocks of capital and begins to pay back in small annual amounts.

In the first stage, therefore, the country's net long-term capital imports exceed its net payments on interest and dividend account. A country in this stage tends to have a surplus of imports or, more accurately, a net deficit on current account even when interest and dividends are excluded. (The net deficit would clearly be larger if the latter were included.) The net deficit on current account may be likened to the position of a young married couple who are building their home largely with borrowed funds. In addition to normal purchases

of food, clothing, entertainment, and so on out of wage or salary income, the couple is, in effect, buying large blocks of lumber, cement, paint, and home furnishings, which are the ingredients of its capital investment. The couple's current purchases are greatly in excess of its current wage or salary income—that is, the couple has a net deficit in its current account. This family is obviously a net debtor, and our country in the first stage is just as clearly a net international debtor.

In the second stage, the country has succeeded in building the core of its transportation, public utility, and industrial system largely with the aid of foreign funds and foreignproduced equipment. As a result, its net imports of capital are small in this stage, but its interest and dividend payments are larger than before, in part because it was piling up foreign debt over a number of years so that annual payments of interest are large, and in part because foreign-owned plants, now seasoned, are probably on a higher dividend-paying basis.

The position of a borrowing country in the second stage is thus one in which there are net long-term imports of capital but even larger net interest and dividend payments. The relation of capital imports to interest and dividend payments is just the opposite of that in the first stage. In the second stage, therefore, the country tends to have a surplus of exports or, more accurately, a net surplus on current account excluding interest and dividends. Since the net debits on interest and dividend account are so large, however, the current account as a whole will show a net deficit. This stage in the country's evolution will probably not be reached until after many years have been spent in the first stage. In the second stage, therefore, the country is still a net international debtor: its international liabilities exceed any foreign assets which it may have acquired by its own foreign lending.

In the third stage, the country has shifted from a net longterm capital importer to a net long-term capital exporter, the capital-export position probably reflecting repatriation and redemption operations more than new long-term lending itself. That is to say, the country is still importing some capital but its combined operations of (a) new foreign lending and (b) buying back and redeeming its outstanding foreign debt represent a sum that exceeds its capital imports. And having been a net importer of capital in the first two stages, the country will owe more interest-bearing debt (debt here also includes foreigners' claims to dividends) than it owns, with the result that it will continue to make net interest and dividend payments to foreigners in stage three. The country will tend to have an export surplus, or rather, a surplus on current account considered as a whole. This surplus will be connected with the fact that the country is now a net long-term capital exporter. What, however, is the country's international creditor-debtor status? It is still a net international debtor, as evidenced by the excess of foreign debt owed over foreign debt owned and by its net interest and dividend payments.

Stage four differs from the preceding stage in that the country now has net interest and dividend receipts. As in the preceding stage, it is a net long-term capital exporter and because it has just gone on a net-interest-and-dividend-receipt basis, its net receipts of interest and dividends will be less than its net exports of long-term capital. In other words, the country is still more actively engaged in current lending than it is in receiving the fruits of past lending. It is the excess of net long-term capital exports over net interest and dividend receipts which is the distinguishing characteristic of stage four. Since its net capital exports exceed its net interest and dividend receipts, it will have a surplus on current account even excluding net interest and dividends. The country is now a net creditor on international account.

In the fifth stage, the country has reached a position in which it is mainly engaged in harvesting the fruit of past foreign lending. Its net interest and dividend receipts now exceed its net long-term exports of capital. The country will tend to have a net deficit on current account when interest and

dividends are excluded, but there, will be a surplus for the account as a whole. As in the case of stages three and four, the surplus on current account will be connected with the country's position as a net long-term capital exporter. If it wished, the country could substitute greater consumption for greater foreign investment—that is, it could substitute greater imports of goods and services for its net capital exports; but if the country is typical, it will continue to add to its foreign capital, although at a slower pace. A country in stage five is called a mature creditor on international account.

We may indicate a sixth stage that is based largely on the experience of World War II, although the inclusion of such a stage is not customary. Because of war damage, loss of exports, and wartime disinvestment, previously wealthy imperial countries may be faced with serious balance-of-payments prospects plus sizable new foreign indebtedness. Great Britain, as has been noted previously, is faced with a large current-account deficit, requiring a drastic curtailment of imports or new foreign borrowing to offset the deficit, or both. As compared with stage five, countries such as Britain will (1) be recipients of less not income on interest and dividend account and (2) probably be net importers of capital in the form of formal loans or the sale of foreign assects.

In the sixth stage, therefore, the country's net receipts of interest and dividends will be less than the deficit in the rest of the current account, and the country will thus have to import capital to make up the difference. If it had previously been a net international creditor by a small margin, it will now revert to a net debtor. If, however, its position in stage five was that of a net creditor by a large margin, it could remain in that status in the sixth stage.

The sub-tance of the foregoing analysis is presented in schematic form in Table 36. An inspection of this table will serve as a summary of the analysis and as a review of its outstanding points.

The reader will note that the treatment in the preceding

pages is purely analytical and highly simplified. For example, a country may actually skip several stages or revert to one that was experienced earlier. Moreover, the treatment makes no allowance for important autonomous short-term capital movements. Yet it is of interest to note that Britain's

TABLE 36
SCHEMATIC SUMMARY OF THE BORROWING-AND-LENDING STAGES

(1)	(2)	(3) NET	(4)	(5)	(6)
	NET LONG-TERM	INTEREST		NET	NET LONG-TERM
	CAPITAL EXPORTER (+) OR IMPORTER	DIVIDEND RECEIPTS (+) OR PAYMENTS	COLUMN 3 GREATER OR LESS THAN	CURRENT- ACCOUNT SURPLUS (+) OR	INTERNA- TIONAL CREDITOR (+) OR
STAGE	(-)	(-)	COLUMN 2	DEFICIT (-)	
1	_		<	_	
2	_	_	>	-	_
3	+	-	<	+	-
4	+	+	<	+	+
5 6 °	+	+	?	<u>+</u>	+ ?

historical experience has closely followed the six-stage pattern. Prior to World War II, Great Britain had been in stage five for many years, occupying first place in the international investment sphere. As a result of the recent war, however. Britain's international liabilities have come to exceed her international assets, so that she is now a net debtor. But she was still a net recipient of interest and dividends at the end of the war, owing to the fact that the percentage of interest and dividends on her foreign assets was higher than the percentage on her foreign liabilities. In the case of the United States, the statistics suggest that we were in the first stage up to about 1875, and in the second stage from 1875 to 1914. By 1919 we had emerged a net creditor, owing to large-scale foreign investments and repurchases of foreign-held obliga-

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tions during World War I. Stage four was reached during the 1920's, when our net long-term capital exports exceeded net-interest and dividend receipts. Since 1930, however, American experience has been directly counter to the evolutionary pattern; the United States found itself a large net importer of both long- and short-term capital. But we remained an international creditor, as our foreign assets (excluding gold) continued to exceed our foreign liabilities.

#### Loans Transferred in Form of Goods

Traditional teaching stresses an aspect of the preceding stages analysis which should be treated explicitly, namely, that the capital-importing country receives loans, not in the form of money but in the form of goods or, more accurately, in the form of a net commodity and service import surplus. Let us indicate the process, at least in its main outlines, by which this result is reached. This process is known in economics literature as the mechanism of adjustment of international balances to a disturbance of international equilibrium, the disturbing factor in the present case being an international loan. The basic assumption is that simple gold-standard conditions prevail.

When a country (B) borrows capital from abroad, it obtains a claim to the lending country's (L's) currency. B can immediately spend all of the sum involved in the purchase of L's goods, such as steel rails, locomotives, turbine generators, and so on. In this case, B would clearly receive all of the loan in the form of goods. But few cases are as simple as this. What has usually happened is that only a part of the loan is initially spent on L's goods; the remainder is kept abroad to augment the foreign balances of B's banks (for subsequent sale to demanders of foreign exchange) or is used to purchase gold for import into B for the purpose of increasing B's money supply. Briefly, then, the proceeds of a loan are spent in part in the immediate purchase of foreign goods and in part in the purchase of domestic goods.

Writers on economics clearly saw that a loan could be transferred wholly in the form of goods only if B developed an excess of imports over exports equal to the amount of the loan. How could this occur, however, if B spent a part of the proceeds of the loan in the purchase of domestic goods? A study of the relative changes of prices and demands reveals the answer. The writers pointed out that increased purchases of domestic goods would raise their prices relative to international commodities because of the impact of a greater flow of money against a relatively unchanged stream of domestic output. This shift of relative prices would necessarily involve raising export prices relative to import prices, so that the effect would be to decrease B's exports and increase its imports sufficiently to effect a transfer of the loan in the form of goods.

The history of international borrowing during the period of the effective operation of the international gold standard—that is, the several decades prior to 1914—reveals that a number of countries effected the transfer of loans in the form of goods substantially as indicated in the above statement. The variations from type, however, were numerous and sometimes complicated, but the explanation of the mechanism of adjustment under simplified conditions at least sheds important light upon the essential processes involved. The reader will still find that the traditional exposition is helpful in the understanding of important phases of modern international lending.

#### Development of Backward Areas

The economic development of relatively backward areas can proceed on two bases: It can be effected, as was the case in the Soviet Union during the interwar period, without material participation by foreign lenders. Starting virtually from scratch, the Soviet Union in a few years developed an industrial economy which was strong enough to enable the country to meet successfully the greatest military challenge the world has seen. With minor exceptions, the industrial plant which

emerged in two decades from a formerly one-sided agricultural country was made in the Soviet Union. It would be more accurate and meaningful, however, to say that the Soviet industrial plant was squeezed out of the low standard of living of the people, simply because countries that had investment surpluses did not participate and because of the speed with which it was carried out. It is possible, under a totalitarian form of government, to develop a country's resources in the manner described, but the process is a painful one and inherently undesirable. Moreover, the procedure is unworkable in a democratic society, since it requires the citizenry to undergo deprivations which are not freely acceptable.

Another closely related method of developing relatively backward areas without material participation by foreign lenders is that which operates through selective exchange control. During the development phase, however, the method would clearly involve keeping the standard of living below what it might otherwise be. In terms of real goods and services foregone, the cost probably would be considerably greater than the cost of servicing foreign loans. This alternative method thus involves deprivations similar to those in the case of the Soviet Union.

The second basis on which the economic development of relatively backward areas can proceed is that which takes the form of a lending-borrowing relationship. Our own economic development provides a classic illustration of this method. During the nineteenth century, the United States borrowed heavily from the major lending countries of western Europe, particularly in connection with the development of our great internal transportation system. We were able to tap the investible surpluses of other countries, and thus our people were permitted to develop free institutions and to enjoy the fruits of an expanding and diversified economy. Moreover, the countries lending to us were materially enriched by the interest and dividends received on their American investments.

So great has been our own economic development that today we are the world's greatest lender.<sup>1</sup>

Over vast expanses of the globe the need for economic development is roughly the same as was the need in our own country over the last century or more. Without exception, agricultural and raw-material countries are eager to industrialize, to develop their transportation systems, to establish hydroelectric plants, and to diversify their agriculture. In some cases, to be sure, visionary schemes are proposed. By and large, however, their hopes and expectations are reasonable and in line with the requirements of our age.

The need for foreign investment is not confined to the requirements for the development of relatively backward areas. In the major industrial countries, and especially in the United States, foreign investment is needed to absorb a part of the large annual savings. With the distribution of income being what it is in countries such as the United States, there is a greater likelihood of approaching equality of savings and investment if there are large and steady outlets for savings in the, form of foreign investment. This process of foreign

<sup>&</sup>lt;sup>1</sup>In the literature on the prospects of American foreign lending in the twentieth century, it is common to find the discussion running in terms of successful British lending during the nineteenth century. But it is important to note significant differences in the two cases. The loans made by Britain in the last century were predominantly for the development of agriculture and the production of food and raw materials which Britain wanted to buy. During most of the period, a free-trade policy was pursued by the creditor. This combination of circumstances provided almost automatically for the servicing of the loans. There will be no similar provision for the servicing of loans made by the United States Repayment by borrowing countries will take the form. to a considerable degree, of the reduction of imports or the exportation of manufactured goods The result is that the servicing of dollar loans in the twentieth century will require far greater internal adjustment in the United States than was required in Britain during the preceding century. An improved distribution of income, however, should serve to reduce the severity of the disturbances as compared to what they might otherwise be. Moreover, United States lending following World War II seems destined to be for unproductive purposes to an important extent. Dollar loans aggregating many billions are to be used to reconstruct war devastation and to cover temporary balance-of-payments deficits. Important as such lending will be in connection with the restoration of world trade, it is not likely to result in any net increase in the productivity of the borrowers.

investment expedites the development of the world's productivity. Later on, as income distribution is rectified, the rate of savings lessened, and the desire for imports enlarged, the older industrial countries will be able to tap a greater quantity and variety of goods from all parts of the world. Such, in brief outline, is the probable nature of the future foreign-investment cycle.

There is also a temporary reason why the United States, in particular, will want to expand foreign investment. We will want to do so in order to relieve our own economic difficulties. The great war-induced expansion of productive capacity will require fewer adjustments and shifts in plant capacity if foreign lending enables us to maintain our exports. It is partly because of this factor, and partly because of new conceptions of our international political position, that there is today an American attitude towards international investment that contrasts strongly with the views prevailing during the 1930's. Before we take up this new attitude and some of the problems that will have to be faced, let us sketch briefly the history of our investment relations with the world.

#### The United States as a Borrower and Lender

During most of our history as a nation, we have been a borrower rather than a lender of capital. It was not until the twentieth century that American funds began to go abroad in important amounts. According to the Department of Commerce, foreigners had investments in the United States totaling some 250 million dollars in 1850. By 1914 these investments had increased to about six billion dollars. On the other hand, United States investments abroad, most of which were held in the neighboring countries of Canada, Mexico, and Cuba, totaled only about 2.3 billion dollars as of 1914. At the outset of World War I, therefore, we were a net debtor to the extent of about 3.7 billion dollars.

There was a profound shift in our international investment position as a result of World War I. Unlike the case during

World War II, when the device of Lend-Lease was used to avoid formal lending to other members of the United Nations, we extended large loans to other governments both before and after we entered World War I. As a result, the United States shifted from a position of a net debtor to that of a leading creditor. Some two billion dollars of American securities formerly held by foreigners were resold by them to Americans. Private banks extended large loans to finance war exports before we entered the war, but thereafter loans were made directly by the United States Government. When the war ended, the United States was a net creditor to the extent of over 10 billion dollars. About three fourths of this total represented foreign indebtedness to our government—the so-called intergovernmental debt. Table 37 indicates the status of this debt as of 1944.

Although United States foreign lending continued heavy after World War I, and particularly during the twelve-year period 1920–1931 (when our long-term capital exports totaled 11.5 billion dollars), our net-creditor position has steadily declined. This has resulted mainly from the elimination of the defaulted Inter-Ally war debts, but is also the result of the accumulation of assets in the United States on the part of foreigners. By the end of 1939, United States foreign investments amounted to 11.4 billion dollars and foreign assets in the United States totaled 9.5 billion dollars. At the beginning of World War II, therefore, the United States was a net creditor to the extent of 1.9 billion dollars.

There were two outstanding features of the large-scale lending by the United States during the interwar period. First, our foreign-investment operations were often conducted carelessly, with high rates of interest and exorbitant profits going to middlemen, on the one hand, and the loan funds put to unproductive uses by the borrowers, on the other. Secondly,

<sup>&</sup>lt;sup>2</sup>Excluding holdings of gold. Under existing law relating to the reserves behind Federal Reserve notes and deposits, most of the gold held in the United States is not available for making foreign payments.

TABLE 37,
STATUE OF THE IND NESS OF FOREIGN GOVERNMENTS TO THE
UNITED STATES AS OF NOVEMBER 15, 1944°
(in million dollars)

	TOTAL							
	INDEBTED-	TOTAL	INDEB	INDEBTEDNESS		PAYMENTS ON		
	NESS (PAY-	PAY-			ACCOUNT			
COUNTRY	ON	MENTS	PRIN-					
	PRINCIPAL	RE-	CIPAL	ACCRUED	PRIN-			
	DEDUCTED)	CEIVED	(NET)	INTEREST	CIPAL	INTEREST		
Armenia	26.8	_	12.0	14.8				
Belgium	495,3	52.2	400.7	94.6	19.2	33 0		
Cuba		12,3		_	10.0	2.3		
Czechoslovakia	170.5	20.1	165.2	5.2	19.8	.3		
Estonia	23.9	1,2	16.5	7.5		1.2		
Finland	8.7	6.6	7.9	.8	1.1	5 5		
France	4,529.6	486.1	3,863.6	665.9	226.0	260.0		
Germany (Aus-								
trian debt)	26.0	.9	26.0		.9			
Great Britain	6,263.8	2,024.8	4,368 0	1,895.8	434.2	1,509.7		
Greece	36.7	4.1	31.5	5.1	1.0	3 1		
Hungary	· 2.7	.6	1.9	.8	.1	.5		
Italy	2,047.2	100.8	2,004.9	42.3	37.5	63.4		
Latvia	9.9	.8	6.9	3.0		.8		
Lithuania	8.8	1,2	6.2	2.7	.2	1.0		
Nicaragua		.2	_		.2	7-		
Poland	299.3	22.6	206 1	93.3	1.3	21.3		
Rumania	73.1	4.8	63.9	9.3	4.5	.3		
Russia	443.1	8.8	192.6	250.5	-	8.8		
Yugoslavia	63.1	2.6	61.6	1.5	2.0	.6		
Total	14,528.5	2,750.7	11,435.5	3,093 1	757.8	1,993 0		

<sup>&</sup>lt;sup>a</sup> Source: Annual Report of the Secretary of the Treasury, 1944, p. 734. Washington, 1945. The figures are not strictly additive because they have been rounded to tenths of millions.

partly because of these circumstances and partly because of the instability of our own imports, loans floated during the interwar period frequently resulted in partial or total default. The record was characterized by a sufficient volume of defaults to disillusion most investors. As a nation, we came to doubt, during the 1930's, whether it would ever again be wise to invest abroad.

Yet the facts of the case show that a large part of the foreign

investments eventually proved advantageous both to the recipient countries and to the United States. Taken as a whole, the loans were put to uses that were productive. For another thing, from the point of view of the United States, our lending has not been unremunerative. Thus, an official study of the Department of Commerce shows that there was a substantial net return on private foreign investments made by the United States during the interwar period. The record may be summarized in Table 38.

TABLE 38

RETURN ON UNITED STATES PRIVATE FOREIGN INVESTMENTS, 1920 THROUGH 1940° (in billion dollars)

1. Investment Outlay		
Estimated investments abroad at the end of 1919  Net new investments abroad from 1920 through 1940 (gross new investments abroad of 11.8 billion dollars less amortization receipts on foreign dollar bonds and net resales of	6.5	
foreign securities to foreigners of 4.9 billion dollars)	6.9	
•		13.4
2. Value of Investments and Receipts Therefrom		
Value of investments abroad at the end of 1940	9.8	
Income payments received from 1920 through 1940	12.3	
		22.1
3. Net Return		87

<sup>&</sup>lt;sup>o</sup> Source: Surrey of Current Business, p. 11. November, 1944, as corrected by a subsequent unpublished study by the Department of Commerce.

Although there was a substantial net return on American foreign investments, considered as a whole between 1920 and 1940, it is important to note that the results differed considerably as between the two major types of foreign investments. The story is told quantitatively in Table 39. It will be noticed that the return from portfolio investments (bonds) averaged but 1.6 per cent, whereas the net yield from American direct investments (plants and factories) averaged 6.1 per cent over

the same period. The contrast would be even more marked if the portfolio segment were divided between debts owed by Canada and by the rest of the world because two thirds of the dollar debt not in default in 1940 was debt owed by Canadians. The yield on the portfolio debt owed by the world other than Canada thus works out at about a tenth of the yield from direct investments.

TABLE 39

RETURN FROM PORTFOLIO AND DIRECT INVESTMENTS, 1920 THROUGH 1940 (in billion dollars)

			FOLIO DIR		ECT	TOTAL	
1.	What the United States put in						
	a. Value of investments, end of 1919 b. New investments, 1920-1940	2.6 3.6		3 9 3.3		6 5 6.9	
	c. Net amount of investment as of December 31, 1940		62 4.4		7.2 5.6		13 4 10.0
	• • •		7.7		0.0		10.0
	What the United States got out  a. Value of holdings, December 31, 1940—portfolio valued at market values and direct investments at book value  b. Income payments received on in-	2.8		7.0		9.8	1
٠.	vestments, 1920 through 1940	49		7.4		12.3	
		_	7.7	_	14.4		22.1
3,	Excess of what the United States got out over what the United States put in (in						
	21 years)		1.5		7.2		8.7
4.	Average got out per year		0 07		0.34		
5.	Average got out per year as a percentage of average investment for period		16%		6.1%		

# Some Problems of Foreign Investment

We have sketched the history of our foreign lending, indicated some of the difficulties of the past, and pointed out that a substantial net return was realized on our interwar investments. We shall proceed forthwith to discuss some of the major problems of foreign investment. The discussion will be focused on the problems of the United States in this field.

The Importance of American Imports. It may appear somewhat strange to begin a discussion of the problems of foreign investment by considering the question of American imports. A moment's reflection, however, will prove that such is not the case. Imports are of crucial significance because, given the importance of the United States in the world economy, the level and stability of imports of goods and services determine basically the long-term prospects for repayment of foreign loans.<sup>3</sup> In fact, it is no exaggeration to say that the size of our imports will, in the last analysis, determine the strength of our economic ties with other countries. If the outside world can count on a high and stable level of American imports, it can easily plan to service rather large foreign loans. If, on the other hand, we are to have American

<sup>&</sup>lt;sup>a</sup> In the literature on foreign investment it is sometimes stated, particularly by British writers, that a country's foreign-investment policy need consist of nothing more than a willingness to invest its annual surplus on current account. This is supposed to have been the British policy in the nineteenth century; and it is stated that it should be America's policy in this century. If America were to adopt such a policy, it need never have a larger current-account surplus than it wants to have The argument continues that if, on the other hand, the United States does not follow such a policy, the adjustment of new foreign lending to the balance of payments on current account will be left purely to chance, with smooth adjustment at some times and no adjustment at other times.

Does the causation run from the size of the balance of payments on current account to the volume of new international lending? Perhaps so under ideal conditions-perhaps, that is, under conditions in which fluidity is such that current-account balance would be achieved and maintained if investors elected to abstain completely from foreign investment. But in the actual world, a country's balance on current account is determined by a combination of circumstances, including investors' preferences as to the location of their investments, maladjusted exchange rates (for instance, overvalued currencies), prosperity or depression in a major industrial nation, and so forth. In other words. maladjustment in other countries usually is partly responsible for the size of a given country's current-account surplus. It follows that a foreign-investment policy along the lines of that suggested in the preceding paragraph would make foreign maladjustment one of the determinants of a country's level of foreign investment. Besides, from the experience of the United States, it would seem that the causation runs from long-term capital movements to the status of the current account, and not the other way around.

imports which are low on the average and widely fluctuating, the outside world will have difficulty even in arranging to pay for vital current imports.

The Problem of Repayment. Foreign investments are not intended to be gifts,4 and however humanitarian from a broad world point of view gifts might be in some instances, they should not masquerade as loans. Besides, in the present state of international diplomacy, gifts probably would be received by the outside world in inverse proportion to need. Clearly, then, foreign investments must be repaid. But what does the repayment of capital mean? From the point of view of an international banker interested in a single bond issue, there is an expectation of a yearly yield on the capital as well as the repayment of the capital, and this is as it should be. From the point of view of a country as a whole, however, the repayment of capital is something which should take place gradually In the short run, wholesale repayment is unnecessary and wasteful even if it could be arranged. When the world tried to repay capital in the 1930's, the international financial system collapsed, and it is not surprising that this was so. The reader can perhaps see this for himself if he tries to explain what would happen if the United States Government tried to repay its debt, which is almost twice the size of the largest net national income ever experienced. Vast sums can be repaid quickly only through new borrowing, or what is technically known as refunding. The only sound rule is that a good investment should pay a good rate of interest or a good dividend. If a good return is realized, it is unnecessary to worry about the repayment of capital.

<sup>\*</sup>Only slightly different from the gift entegory is the case of the exchance of goods for gold, at least with respect to the position of the United States. The public still regards gold as something unique, but this view is a holdover from the past. When we receive gold in exchange for goods, we are not paid in the economic sense until we can sell the gold back to foreigners for their goods. The United States already has all the gold it needs for meeting possible deficits in the balance of payments. In modern countries, gold reserves behind notes are a legacy of the past, as witness the fact that Canada does not have any gold-reserve requirements whatsoever. Our huge hoard of gold, for example, did not even begin to serve as a once-vaunted sinew of war in World War II

For the United States or any other lending country, therefore, attention should not be focused on repayment—except with respect to individual loan transactions which run for the contract period, and then the proceeds should generally be reinvested abroad-but should be concentrated instead upon borrowers' capacity to service any given total of loans. The level of borrowing by the world should be related to the amount that it can safely pay in the form of interest and amortization on a yearly basis. Nothing more should be expected, in fairness to borrowers and lenders alike. And whatever such level turns out to be, it should be kept steady. Borrowers have the obligation to use loan funds for productive purposes, and lenders have the equally important obligation to adopt appropriate import policies and not to expect wholesale repayment of existing indebtedness. The translation of this broad policy into proper individual decisions calls for national economic statesmanship of a high order.

Fixed Interest Debt versus Equitics. Given fluctuations in the balance-of-payments position of borrowing countries, any single level of fixed debt-service charge will represent a varying burden to the borrowing country. If a customary large surplus on current account suddenly becomes a small one, or becomes a deficit, the borrowing country will find itself in difficulty, and may have to default on its debt. It is to minimize cases of this sort, while at the same time maintaining a high level of international investment, that some writers have proposed that more investment take the form of the purchase of equity investments and less of the purchase of foreign bonds. (Equities consist of participation in ownership, and earn dividends varying with yearly earnings, which are assumed to fluctuate in the same direction and to about the same extent as the borrowing country's balance of payments.)

As a general rule, it appears that equity investments are preferable, from the standpoint of developing countries, to fixed-interest obligations. The basic issue, however, is not so much one of the character of the contractual obligation as it is one of the effective rate of interest involved. Thus, an equity investment in an industry earning 10 per cent annually may be more burdensome to the developing country, from a balance-of-payments point of view, than a fixed-interest debt of five per cent. If the rate of return differs as much as is here assumed, and such typically is the case, it may well pay the developing country's government to borrow on a long-term fixed-debt basis and in turn lend to those of its own nationals who were prepared to invite foreign-ownership participation. In any case, it is not self-evident that the equity-type investment really is the least burdensome method of borrowing from abroad.

The Need to Assume Risks. Although we stated in a preceding paragraph that American import policy is basic to our international investment policy, our position in world affairs does not allow us to delay an investment program until we achieve a high level of domestic economic activity and a correspondingly high level of imports. It will be necessary to undertake reasonable foreign-investment risks simultaneously with striving to achieve an appropriate import policy.

The Inappropriateness of Tied Loans. Loans, such as those made by the Export-Import Bank of Washington, that require the borrower to spend the proceeds in the lending country are called tied loans. The borrower is tied to unnecessarily restrictive terms under such loans. Such terms are designed to insure the spending of the loan in the lending country, but in reality loans can be spent ultimately only in the lending country. What tied loans achieve, therefore, is not the result which would occur in any case, but the favoring of particular national industries. This is accomplished mainly because the loans are made to finance particular projects, and the proceeds of the loan are spendable only in connection with such projects. Thus, if the Export-Import Bank grants a loan to a foreign country for the purpose of building a new steel plant, the foreign country can spend the loan dollars only in purchasing structural steel, hoists, cranes, and so on from a few American

manufacturing companies. Strict multilateralism would require that no such strings be attached to the granting of the loan, in order that the borrower might be free to transfer loan dollars into, let us say, French francs for the purpose of buying French goods. Frenchmen who thus acquire dollars can spend them solely in the United States. It is only when loan dollars are kept idle that American trade is not benefited, but in a world that has only too lively an awareness of a so-called shortage of dollars, we can rest assured that few dollars will be kept in a state of idleness.

Loans without strings attached must of necessity be spent in the lending country sooner or later. It has aptly been stated that such loans seep back to the lending country through the myriad channels of international competitive trade as a shower of rain, falling on open fields, fertilizes them and ultimately returns to the river and the sea. Tied loans, in contrast, have been compared with a thunderstorm which results in the washing away of valuable top soil as the waters madly rush to the river, silting up the latter in the process.

Foreigners frequently remind the United States that it does not practice in the realm of loan policy the doctrine of multilateralism, which it espouses in the field of commercial policy. Specifically, it is stated that it is inconsistent to criticize countries that use their import bargaining power to extract special (bilateral-trade) favors from weaker raw-material countries and at the same time to insist, because we are the world's greatest lender, that the proceeds of American loans be spent on American goods. We cannot deny the correctness of the charge. If a sense of proportion is to be maintained, however, it should be recognized (1) that historically most of the world's foreign lending has in fact been in what amounts to the tied form and (2) that tied transactions in international commerce are not confined to loans. Some of the same countries that criticize American tied loans themselves own foreign direct investments, especially railways, which are so managed as to place equipment orders decade after decade not only exclusively in the investing country but also exclusively with one or two equipment companies in such country. Tied transactions of one sort or another are all too common in international trade.

# Investment and Competitive Industrialization

A common fear among investors in the older industrial countries is that foreign investment serves mainly to create competing industrial countries and thus, in the long run, to reduce international trade. Like many judgments in the field of economics, this is an inadmissible generalization from specific cases. There can be no question that capital exports will harm some particular industries. Thus, when the British financed the construction of American railways, they opened up new wheat lands which served to displace the wheat fields of the United Kingdom. Similarly, the development of Venezuelan oil fields by American capital provides a source of oil to the world that is competitive with our Gulf Coast fields. If our economy is flexible and adaptable, however, capital exports need result in no more than temporary disturbances to some sectors. Such temporary difficulties will be more than offset if the resulting increased foreign productivity is translated into greater purchasing power, thus enabling foreigners to purchase a greater total of American goods.

Also, experience tends to show that international trade increases as countries industrialize, and that heavily industrialized countries are the best customers of other industrial countries. Thus, in 1937 the thirteen most industrialized countries, with the exception of Britain, Japan, and Italy, each sold more than half of its exports to other industrialized countries.

There is another factor to consider in connection with the problem of competitive industrialization. Foreign countries that are determined to industrialize would be able to carry out their program, though at slower pace, even if countries such as the United States were to deny them the necessary capital

loans. 'They could use the device of exchange control to reserve all dollars, obtained from current exports, exclusively for the importation of capital goods. Policies of this character already have been carried out by some countries for brief periods.

#### International Investment and War Debts

Loans granted by one country to another for the purpose of financing war have a prominent place in the history of international finance. The international debt structure is to a considerable degree the product of war debts. The role of war debts is particularly important in the international financial history of the United States, especially during the present century. Although this experience (as well as other war-debt history) involves many specific historical events which are of considerable interest, it would take us too far afield to discuss the purely historical aspects. For an understanding of the principal features of international investment, it will be adequate if we confine our discussion to some of the central issues involved.

The outstanding feature of the effects of war debts is the vast dislocation which they bring about in the structure of international debt. This dislocation is great mainly because (1) war debts arise too suddenly to enable national industries to become adapted to them and because (2) the debts are not accompanied by any (noticeable) increase in the productive capacity of the borrowing countries. Classic illustrations are found in the cases of Germany and the United States. Owing to monetary reparations imposed on her by the victorious powers in World War I and because of the interest pavable on reconstruction loans raised after the war. Germany had to make very large foreign payments. The character of her readjustment was conditioned in part by large-scale borrowing in the 1920's. But by 1928 she had to create a large surplus of exports over imports. The magnitude of the problem was such that Germany had neither the time nor the opportunity

to change her industrial system for the purpose of creating the export surplus in a manner that was acceptable both to foreigners and to her own people.

Similarly. America's adjustment to her new creditor position, though requiring a set of changes just the opposite of those required of Germany, proved quite unsuccessful. The United States should have created and maintained an import surplus for receiving payment in the form of goods, the only manner in which loans can ultimately be repaid. Both manufacturing and agricultural interests blocked the needed adjustment. Manufacturers were opposed to any large increase of imports, and farmers as a group were reluctant to see any sharp cut in their exports. We thus persisted in the maintenance of a balance-of-payments position appropriate to a debtor country. Foreigners struggled to pay us by the most disturbing method known-by sending us gold. Much less inconvenience would have resulted had the United States developed and maintained the position of a great international lender. It was well within our power to have done so. We did not seem to have the necessary foresight on the political front, although the principles involved were well known in financial circles. Such, in brief, was one important aspect of the troublesome international economics of the interwar period.

A new international debt problem has developed as the result of World War II, this time mainly involving Great Britain. After the first World War, the United States was converted from a debtor to a creditor country; as the result of the second World War, Britain has become a debtor nation.<sup>3</sup> The rela-

The great bulk of Britain's war debt is owed to sterling-area countries such as India and Egypt, where wartime inflation was a leading factor in determining the size of the British obligation. Heavy British war expenditures in India and Egypt were made at prices considerably more inflated than those in England, but the official rates of exchange at which conversions were made were unchanged from the prewar levels. If Indian and Egyptian prices are readjusted to correspond to the same average percentage increase over prewar prices as occurred in Britain, perhaps a third to a half of the British debt to these countries would be wiped out. On the other hand, it should be borne in mind that these creditors have very low standards of living, with small lending

tively sudden shift of status will require adjustments of the first order of magnitude in a short space of time. Earnings from shipping and foreign investments, which formerly bulked large among her foreign receipts; will have greatly declined. The maintenance of imports is deemed necessary if a fall in the standard of living is to be avoided. The only important line of attack, therefore, will be by way of an increase in the quantity of exports, an objective which will not be easy of attainment in the face of increased self-sufficiency in many of the less developed countries of the world. Nothing short of a greatly expanded volume of international trade is required to enable Britain to solve her problem. But it appears doubtful if there really will be anything like the restoration of the economic position of old; for Britain, together with western Europe as a whole, has irrevocably receded in the face of profound developments which are only beginning to occur in such richly endowed areas as the Soviet Union, Brazil, Canada, China, and India. World progress typically produces such results.

## Summary

Whether a country is a net international creditor or debtor depends, as was pointed out, upon the relation of its international assets to its foreign liabilities, both considered as of the same moment of time. If the former exceed the latter, the country is a net creditor on international account; it is a net debtor in the opposite situation. The creditor-debtor position was then illustrated by reference to a series of hypothetical stages through which a country tends to pass in its international financial evolution. We indicated six such stages, representing successively the borrowing, interest-paying, debt-repaying, lending, interest-receiving, and renewed-borrowing

capacity except under conditions of extreme pressure. They lend, therefore, not from real savuncs, which are small, but involuntarily by the process of serious physical deprivation. The Bengal famine of 1913, a direct consequence of the war, is a poignant case in point Moreover, it remains to be seen whether British export prices in the early postwar years will not be heavily inflated according to the maximum that a goods-hungry world will bear.

stages. The discussion of each stage revealed the country's debtor-creditor status, as well as the outstanding relations between the principal items of its balance of payments.

We next devoted a brief section to discussing the process by which loans are transferred in the form of goods, a matter that was covered implicitly in the preceding section on the borrowing-and-lending stages. Within the scope of highly simplified assumptions, we saw that price and demand adjustments occur in such a way as to cause a reduction in the borrowing country's exports, relative to its imports, sufficiently to permit the country to effect a transfer of an international loan in the form of goods. Although the transfer problem is complicated in reality, it can only be understood if approached along the lines of the simplified exposition of this section.

The remainder of the chapter was concerned with broad questions of international investment. As a means of bringing about the development of backward areas, international investment could be dispensed with if countries were prepared to develop from within, as the Soviet Union did during the interwar period. But such an alternative is admittedly unsatisfactory, both to the country which undergoes the sacrifices and to the high-savings countries having large capacities for investment. The time may come when the most elemental needs of present-day backward areas are fulfilled and the high savings of industrial economies are reduced to manageable proportions. In the meantime, international investment has an important and necessary role to play.

During most of our history as a nation, we were a borrower of capital. It was not until after World War I that we became an important international lender in our own right. But our lending to date has not been either particularly profitable or excellent in conception and execution. In an over-all picture, we can see that an important positive return was realized on foreign investments during the interwar period, but the record in the case of American portfolio investments was poor.

Among the problems of foreign investment in the case of a

country such as the United States, none is more important than the need for a widespread understanding of the basic importance of an import policy that is geared to our creditor status. Unless imports are permitted in adequate volume, it will be difficult to avoid having loans emerge as gifts. The repayment problem is also important, especially since experience shows that anything other than gradual repayment only leads to great international disturbances. Flexibility of debt service is important if the flexibility is not paid for in terms of excessive rates of interest. For this reason, there is much to be said for equity investment as distinct from fixed-interest debt. Finally, tied loans, which restrict the freedom of borrowers, are inappropriate in the case of a country with the financial strength of the United States. Yet, tied loans are a feature of the lending of the government-owned Export-Import Bank. Tied loans represent a means of taking undue advantage of our financial bargaining position; they should be eschewed for the same reason that we ask other nations to avoid the use of arbitrary and discriminatory trade practices.

The fear that competing industries will be established abroad as a result of American foreign lending is only partly grounded in fact. Some of the less efficient American industries may be harmed, to be sure; but as a general rule the development of industries abroad raises foreign productivity and income to such an extent as to make foreign countries, taken as a group, far better customers for American products.

The chapter also touched upon the question of war debts. Wars usually create vast dislocations in the structure of international debt, the burden of which is high because borrowing for war seldom enables the borrower to increase his productive capacity. New creditor countries, shifting from a debtor to a creditor position almost overnight, are slow in adjusting themselves to their new position. The main result is that the condition of the balance of payments of debtors is made much more difficult than it should be.

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# Chapter 34

# The International ank for Reconstruction and Development

The companion agreement to the Bretton Woods agreement on the International Monetary Fund was the accord reached on the International Bank for Reconstruction and Development. Forty-four nations agreed that international monetary co-operation required something more than the establishment of the Fund, which is designed to meet the short-term requirements of international monetary co-operation. Positive action was also needed on the long-term investment front. It is here that the Bank fits into the picture. Like the Fund, the Bank also began operations in 1946. This institution is intended to promote the international flow of long-term capital for the two general purposes indicated in its title, namely, to help restore economies devastated or disrupted by World War II, and to help develop the productive facilities and resources of more backward areas.

#### Some Lessons from the Past

In view of the fact that the United States is the only important creditor country left in the world, it may be useful to approach a consideration of the Bank by reviewing our own experience in the international lending field after World War I. The outstanding fact of our past experience was the high proportion of foreign dollar bonds which lapsed into default. The resultant financial losses to American investors were very heavy. In consequence, during the 1930's Americans virtually lost confidence in foreign investment. The loss of confidence

was such that, as a nation, there was no support for the line of poetry spoken by a Dutch delegate to the Bretton Woods International Monetary Conference when he said, "'Tis better to have loaned and lost than never to have loaned at all."

The unsoundness of many of our past loans and the weaknesses in our lending practices were the result of several factors. First, under the unregulated and unco-ordinated lending practices of the 1920's, many foreign loans were made without proper consideration of the debtor's ability to repay and without satisfactory procedures for ensuring that the loan proceeds would be used for productive purposes. This situation resulted, in part, from the fact that we were an immature international lender in a get-rich-quick era. Because of the large commissions to be obtained by underwriting foreign securities. there was an unhealthy competition among investment bankers, including many inexperienced and unscrupulous houses. which resulted in loans being placed without adequate consideration of their soundness. Too often the criterion was "what will the market take?" instead of "what is good for both the borrower and investor?"

Secondly, our past record was marked by overborrowing by individual countries. In a number of instances, loans were made to foreign national governments, provincial governments, and municipalities on the basis of the estimated debt-paying capacity of these entities as individual debtors. The total external debt of the country in question, however, was not adequately considered. A given country's capacity to service foreign debt is limited by its ability to obtain the necessary foreign exchange from exports of goods and services. If too great a share of expected future earnings is mortgaged to cover payments on debt account, there may be severe strain on the balance of payments.

In the third place, past international lending frequently involved onerous terms. The yield to the public on Latin American bonds offered in the United States in the 1920's, for example, averaged over 6½ per cent. Moreover, the large

commissions paid to underwriters further increased the cost to the borrowing countries. If international loans are to be mutually advantageous, the cost to the foreign borrower must not be exorbitant.

In the fourth place, the most disturbing feature of our past lending was its sporadic character. During the 1920's, we not only lent unwisely and too much, but we stopped too suddenly. The world economy no sooner had become adjusted to large foreign investments by the United States than it was confronted with a virtual cessation of such lending. For example. long-term foreign investments dropped by 90 per cent from 1929 to 1932, or from 1.037 to 87 million dollars. The result was that the world economy was unable to withstand the shock of the virtual cessation of loans from the United States. The strain would have been severe enough if the supply of dollars from other sources had held up reasonably well. What happened, however, was that the strain on capital account was superimposed upon a 70-per-cent drop in the value of our imports from 1929 to 1932. The over-all picture is strikingly shown in Table 40, published by the Department of Commerce. A final weakness in our past foreign-investment experience was the unequal assumption of risk. When losses occurred. the United States had to bear the burden alone. A superior procedure would be to have the world as a whole carry the risks of a lending program from which all the world will benefit.

## Structure and Organization of the Bank

Membership in the Bank is open at first to the forty-four nations which were present at the Bretton Woods Conference. but other nations may join with the approval of the institution. All members of the Bank must also belong to the Fund. The purpose of this provision is to reduce the exchange risk of funds invested by or through the Bank.

The Bank has an authorized capital of 10 billion dollars, divided into 100,000 shares of \$100,000.00 each. Only 9.1 billion dollars is subscribed by the countries represented at the Bret-

ton Woods Monetary and Financial Conference of 1944. The difference between 9.1 and 10 billion dollars is to be subscribed by other countries which are expected to join the Fund and Bank. With some exceptions, the minimum subscriptions to

TABLE 40

Decline in Dollars Supplied to Foreign Countries in Relation to Debt-Service Charges, 1929 to 1932 (in million dollars)

	1929	1932	AMOUNT OF DECREASE	PER- CENTAGE DECREASE
Dollars supplied by the United States through purchases of goods and services and new in- vestments abroad	7,400	2,400	5,000	68
Dollars required to meet fixed debt- service payments to the United States (including war debts), as- suming no defaults or adjust- ments	900	900	0	0
Remainder available to foreign countries for the purchase of United States goods and services and for investment in the United States	6,500	1,500	5,000	77

<sup>&</sup>lt;sup>a</sup> Source: The United States in the World Economy, p. 6

the Bank are similar to the quotas in the Fund. The United States subscription is 3,175 million dollars, or 35 per cent of the total. In the order of size, the next four largest subscribers are Great Britain (14.3 per cent), the Soviet Union (13.2 per cent), China (6.6 per cent), and France (4.9 per cent).

The total subscription is divided into two parts: (a) Twenty per cent constitutes the Bank's own loan fund and is subject to call as follows: at the start, countries are required to pay two per cent of their subscription in gold or United States dollars. The remaining 18 per cent is payable in the country's own currency. (b) The other part into which the subscription

is divided consists of 80 per cent of the total subscription. This part of the subscription, which will not be paid to the Bank until actually needed, will be used to guarantee obligations (a) that have been floated in the private capital market or (b) that have been floated through the Bank but on the basis of funds which have been borrowed in the market by the Bank.

When losses have to be met, countries will be subject to call to cover such losses. Each country will be able to pay, at its option, either in gold in United States dollars, or in the currency in which the obligation is payable.

The management of the Bank closely parallels the management of the Fund. In both cases, there are a Board of Governors, Executive Directors, and staff officers. Each member of the Bank appoints a governor, and the Board of Governors in turn appoints twelve Executive Directors, who will constitute the real management. The Bank's head office is located in the United States, since this country makes the largest capital subscription. It will be remembered that the Fund is also located in the United States. in view of the fact that we have the largest quota in that institution.

Voting power is distributed according to the same formula as is used in the Fund. Each member country has 250 votes plus one vote for each \$100.000.00 of subscription (or each share of stock held irrespective of the extent to which calls have been made for payment on subscriptions). Assuming that each country subscribes the required minimum, the percentage distribution of voting power is as follows for the five largest countries: United States (31.4). Great Britain (13), the Soviet Union (12). China (6.1), and France (4.6). The British Empire has 24.7 per cent of the total vote.

## Operations of the Bank

The Bank may facilitate or make loans in three principal ways. First, it may guarantee either in whole or in part loans made by private investors through the usual private-invest-

ment channels. Secondly, it may make direct loans out of its own funds. And thirdly, it may grant loans out of funds borrowed from private investors in countries subscribing to the Bank.

The Bank's total loans, however, are limited to the amount of the unimpaired subscribed capital, reserves, and surplus. As was mentioned earlier, the authorized capital is 10 billion dollars. Except in special circumstances, all the Bank's loans and guarantees must be for specific projects of reconstruction and development. A written recommendation by a committee of the Bank is necessary before the Bank can commit itself to any project. Moreover, the Bank can participate only if it is satisfied that the borrower, without the Bank's help, would not be able to obtain a loan on reasonable terms.

Guarantees. The Bank cannot guarantee a loan without the approval of (a) the country in whose markets the funds are raised and (b) the country in whose currency the loan is denominated. After approval is granted, however, the borrower is entitled to exchange the loan proceeds for the currencies of other subscribers to the Bank without restriction. In this case, the lender does not have continuing control over withdrawals of funds by borrowing nations. As compensation for its risks in guaranteeing loans, the Bank receives a commission of from one to one-and-a-half per cent on amounts outstanding during the first ten years of the loan. Thereafter, the commission may be lowered on outstanding loans and either raised or lowered on future loans. The Bank's earnings will be used to build up a reserve fund from which (a) losses may be met and (b) loans made directly to borrowing countries.

Direct Loans Out of Bank's Own Funds. The Bank may make direct loans out of its own funds up to 20 per cent of the total subscription. The two per cent of the subscription, which is paid in gold, may be freely used by the Bank for any purpose, but subscriptions paid in the member country's own

<sup>&</sup>lt;sup>1</sup> The special circumstances include loans for the purpose of stabilizing the exchange value of currencies.

currency (the other 18 of the first 20 per cent of the subscription) may not be loaned or exchanged for other currencies without the subscribing country's permission in each case. The lending country thus has continuing control over withdrawals of funds by borrowers. Moreover, the servicing of such loans must be in the currencies lent, unless the country (or countries) in question specifically agrees otherwise. charge for interest, the length of time the loan is to run. and the schedule of amortization payments are determined by the Bank in the case of each direct loan. It is only required that charges and repayment schedule be reasonable and appropriate to the project being financed. A final point to note in this connection is that the gold value of loans from the Bank's own funds must be kept at the level specified in the original loan contract. Thus, if the original loan contract was in terms of dollars of a specific gold content, but repayable in pounds sterling at the option of the debtor, debt service in pounds must equal the dollar value of the pound payments contracted for at the time the loan was made. In other words, the debts cannot be repaid in a depreciated currency under the aforementioned conditions.

Direct Loans from Funds Borrowed by the Bank. The Bank may borrow funds to make direct loans provided that approval is obtained from the country in whose markets the funds are raised. And if the Bank's loans are in terms of a currency other than that of the country in which the funds were raised, the approval of the currency country is also required. Once approval has been received, however, the currency is fully convertible into other currencies or gold. This case, like that of guarantees, is one in which the lending country does not have continuing control over withdrawals of funds by the borrower. It is also provided that loans outstanding and payable in any one currency cannot exceed the amount of the Bank's own outstanding borrowings in that currency. Thus, if outstanding borrowings by the Bank in dollars total 100 million dollars, the Bank cannot have more than 100 million dollars of its own loans outstanding and payable in dollars. Without this provision, the Bank might force countries short of dollars to obtain that currency by measures which would unnecessarily weaken their exchange-rate position, since the extra dollars would not really be needed to make payments in the United States. On loans made by the Bank from borrowed funds, the rate of commission which may be charged the borrower shall be between one and one-and-a-half per cent per year, on that portion of the loan which is outstanding, during the first ten years of the Bank's operations. This commission is designed to enable the Bank to accumulate reserves out of which losses may be met. After the Bank has been in operation for ten years, it may reduce the commission rate if it feels that its reserve position will not be impaired.

Direct loans, both those involving the Bank's own funds and those which have been borrowed, do not have to be repaid according to absolutely rigid contractual terms. Flexible arrangements can be agreed upon if an appropriate request is made by the borrower and the Bank feels that the circumstances warrant a temporary relaxation of the conditions of payment. Thus, if an acute exchange stringency confronts the borrower, the Bank may relax the payment terms for periods not exceeding three years. During such periods, it may accept payments in the borrower's own currency, provided that the borrower agrees (1) to allow the Bank to make use of its currency, (2) to maintain its value in terms of gold, and (3) to repurchase its currency when it is in a position to do so. The Bank may also modify the terms of amortization or extend the life of the loan when circumstances make these changes desirable. This flexible-repayment feature ranks among the major innovations of the Bank and should do much to remove the burdensome rigidity which has characterized the repayment terms of most long-term loans of the past.

# Results Expected from Operations of the Bank

The International Bank will help to achieve five desirable objectives. Among students of the problem it is generally agreed that in combination, these objectives are vitally neces-

sary to the satisfactory development of international economic relations. Since the foregoing discussion has indicated the general character and functions of the Bank, we may proceed to an enumeration and discussion of its principal objectives. The latter may be enumerated as follows:

To help establish reasonable interest rates and other loan conditions

To heip develop the balanced growth of world trade

To help develop the multilateral character of international investment

To help create an international stake in the regular servicing of loans

To help maintain a high rate of international lending.

The Bank is designed to supplement the role Loan Terms. of private lending institutions. It is expected that the bulk of future foreign investments will continue to be made by private investors. Private investors, however, will obtain real assistance from the Bank. It is intended that such assistance will take the form mainly of guarantees by the Bank of all loans which meet certain stipulated conditions. The Bank thus will stand in the same general relation to private foreign lenders that the Federal Housing Authority occupies in relation to the banks and lending institutions in our domestic housing field. In fact, the bulk (80 per cent) of the Bank's resources will be devoted to the guaranteeing of loans. In addition, the Bank will supplement private lending by making loans from funds borrowed from private investors. Since 80 per cent of the Bank's resources will be used to guarantee loans including those made by the Bank from borrowed funds, the balance, or 20 per cent of its resources, will be available to make direct loans to borrowers from its own funds.

It is through the authority to guarantee loans and to make its own loans that the Bank will exercise its yardstick powers. If the borrower can obtain a loan elsewhere on reasonable terms, the Bank cannot guarantee or make loans. If, however, private loans are not available on reasonable terms, the Bank

first will offer to guarantee the loan. Should the loan still not be obtainable in the private-capital market on reasonable terms, the Bank may make a direct loan to the borrower. In addition to the reasonableness of interest rates, the Bank, as was explained above, will also seek to facilitate reasonable repayment terms by permitting, where clearly necessary, the temporary servicing of loans on terms different from those prescribed by the terms of the loan contract. It is thus expected that the Bank's action, which will vary with the merits of each case, will serve to make for more reasonable lending terms throughout the field of international lending. The Bank, therefore, will serve to reduce or prevent the imposition of onerous loan terms, such as frequently occurred during our own large-scale lending in the 1920's.

Balanced Growth of Trade. Growth in world trade will result in part from the flow of capital goods to underdeveloped regions and in part from the development of the resources of such regions. But increased world trade must be characterized by balanced growth. The Bank will help in this regard (a) by avoiding overlending through continuous study, in conjunction with the Fund, of the current and prospective balances of payments of borrowers and (b) by helping to avoid the dangers of imperialistic lending (which often leads to the lopsided development of some areas). Under international supervision of foreign loans, it will be difficult for foreign investment to be used as an instrument of political policy. The Bank, therefore, will help to avoid two of the difficulties which served to mar our own lending record during the decade following World War I. One of these difficulties, as we have seen, was that of unco-ordinated lending and the frequent disregard of the use to which borrowed funds were put. Another related difficulty was that of overborrowing by individual countries. It will be an important accomplishment if we can reduce the probability of the recurrence of these difficulties.

Multilateral Trade and Investment. The nature of the multilateral-trade benefits which may be expected to result

from the operations of the Bank may be brought out by emphasizing the contrasting restrictions placed on the use of the proceeds of Export-Import Bank loans. The Export-Import Bank of Washington, a government institution, makes what are known as tied loans. That is to say, the proceeds of the loans must be spent, according to the terms of the law, in purchasing products of the United States. In some instances, moreover, goods purchased in the United States under Export-Import Bank loans were required to be shipped in American vessels. Although some American firms benefit from such provisions, international trade is restricted. The borrower is denied the opportunity of buying equipment and other goods in the cheapest market. In contrast to loans under the Export-Import Bank, loans guaranteed or made by the International Bank, once full approval is obtained, carry no strings attached. Dollars borrowed under the Bank may be translated into French francs for the purchase of French equipment. or they may be translated into British pounds to enable the buyer to take advantage of better prices or purchase terms which may be offered in that market. As a result, trade will flow more nearly in accordance with the relative national efficiencies in production. This view, however, is subject to one reservation. The Bank grants the country in whose currency the loan is to be floated a right of veto over the use to which its currency may be put by the borrower. In other words, if the borrower, floating a loan in pounds sterling under the provisions of the Bank, wishes to transfer the pound proceeds into dollars in order to buy, let us say, American locomotives, the British have the right to veto such use of their currency. The British may require their currency to be spent only in British territory or in the sterling area. To the extent that the British exercise their right of veto in this manner, tied loans clearly are involved. It is doubtful, however. whether more than a few countries (having special balance-ofpayments problems of their own) will exercise the right of veto for such a purpose.

International Stake in Repayment of Loans. Countries subscribing to the Bank (which must also be members of the Fund) will make contributions for the dual purpose of (a) sharing losses resulting from defaults on loans guaranteed by the Bank and (b) establishing a fund from which the Bank can make its own loans. The countries will be jointly and severally liable on guarantees and on losses sustained on loans. Each country's liability, however, will be limited to the size of its subscription. (In the case of the United States, the limit is 3,175 million dollars, or 35 per cent of the total.) It follows, therefore, that each country will have a stake in a good repayment record. No longer will defaulting nations have to account to only a single creditor country for their performance under loan contracts. A wholesome purpose will be served by such a distribution of the risks of international lending.

Sustained High-Level International Lending. There is nothing in the Articles of Agreement of the Bank which requires the maintenance of a high rate of international lending. It is reasonably certain, however, that the guarantee and direct-loan functions of the Bank will serve to make for a higher and more sustained level of international investment than would otherwise be likely. We may expect such favorable results because (a) the borrowing needs of capital-poor countries are prodigious and urgent and (b) the available savings which seek investment are sizable in the highly industrialized, capital-rich countries. What is more natural than a marriage of these two sets of circumstances under the auspices of an international institution which is admirably equipped to play the necessary role?

## Summary

Although there are a number of technicalities of a legal sort to be found in the Articles of Agreement of the institution, the Bank is relatively simple both organizationally and functionally. Most of its activities will follow a well-known pattern. It will investigate projects for the reconstruction of war-torn

areas and for the development of backward lands. When it is satisfied that a project is productive and that the borrowing country has a reasonable prospect of repaying the loan, the Bank's job is to grant a loan on reasonable terms. The private-investment mechanism will be used as much as possible. But the Bank will support and reinforce private investment by guaranteeing private loans when necessary and by making loans of its own.

Many benefits will be derived from the operations of the International Bank. It will help countries to achieve stable and more balanced economies. It will distribute the risks of international lending. Although the United States will probably furnish most of the loans that the Bank guarantees, this country's share in meeting the risks involved will be limited to 3,175 million dollars. Loans arranged through the Bank will also serve to avoid the dangers of imperialistic lending, since there will be international supervision. Above all, the combination of international lending on a sound basis and at high and sustained levels, plus a spirit of international collaboration in meeting the problems of urgently needed world development, should prove a pillar of strength in the maintenance of the peace.

Note: In the text, references to the Soviet Union are based on the provisions of the Bretton Woods agreements. The Soviets had not joined either the Bank or the Fund by 1946.

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## Chapter 35

# American Aims and Responsibilities

OME concluding thoughts about the future are called for,<sup>2</sup> and it is appropriate at this point to consider the subject of international economic activity as a unified whole. There is no question that for a country such as the United States a major goal, especially in this age of atomic power, should be the increase of peaceful economic intercourse among the peoples of the world. The peace and prosperity of all countries would be advanced by the increasing development of world trade. If the barriers to trade increase, each country will have to look inward, primarily to its own resources, and the higher and richer ways of life made possible through world trade and travel will be lost. As we have seen in preceding chapters, the pressures to restrict trade are strong, and vigorous effort to expand international trade is necessary to overcome them.

The United States has an important stake in the expansion of world commerce. Although we are a powerful industrial nation, we need vast quantities of goods and services of many kinds. We can employ a part of our large and efficient capacity to exchange goods with the peoples of other countries who, themselves, make other things better or cheaper or different than we can or want to make. If America pursues a program of healthy expansion, other nations are likely to follow suit. A restrictive course toward foreign trade is contrary to American interest because it will be followed by re-

<sup>&</sup>lt;sup>1</sup>These concluding remarks draw in part on the excellent report of the Committee for Economic Development: International Trade, Foreign Investment and Domestic Employment, New York, May 29, 1945.

striction abroad. And all-around restriction will be harmful to living standards in that it will lead to less economy and efficiency in the use of human and natural resources.

## The Prerequisites

The fullest growth of a healthy and expanding world trade and the appropriate development of backward economies depend on seven prerequisites:

1. An effective development of world security.

Such security requires both international organization for the preservation of peace, and an attitude of mind among the peoples of the world favorable to the continuance of peace.

2. The maintenance of high levels of productive employment in the United States and in other highly industrialized nations.

The maintenance of high levels of employment within nations is no less vital to the expansion of world trade than to the growth of a richer life within national economies. When employment is high, imports are on a large scale and the adjustment to changes in demand or supply most easily accomplished. Expenditures for travel are also liberal at such times. On the other hand, mass unemployment within a nation not only reduces its trade directly, but puts it under great pressure to increase its barriers to imports, to subsidize its exports, and to devalue its currency or resort to exchange control in an effort to export part of its unemployment to other nations.

3. Dependable currencies and relationships between currencies to facilitate trade among nations,

If currencies and the relationship between currencies are not dependable, world trade will approach the character of barter or it will consist of special deals based on unstable and arbitrary arrangements. Barter and other special deals restrict international trade and cause much ill will.

4. A steady rate of international investment.

The steady flow of capital from high-savings economies to underdeveloped nations, coupled with sound import policy by the former, will ensure a steady development of the material well-being of peoples.

5. A substantial reduction in the restrictions on world trade. Restrictions on world trade prevent the free flow of goods and services from where they are available to where they are needed. This obstruction prevents efficiency in the use of the world's human and material resources, and is an obstacle to the attainment of a higher living standard. Trade is a two-way street. In the end, exports must be paid for by imports if they are to be paid for at all.

Barriers to trade should be regarded as tools which are more often used badly than well. Unfortunately, their effect has often been misunderstood by their advocates, and what was intended as protection for capital, labor, and natural resources has resulted in shrinking inarkets, the discouragement of ingenuity and invention, and a lower standard of living. Cartels also hamper international trade, and it is a matter of public concern to eliminate the restrictive practices which they promote.

It is also necessary to be vigilant about exchange and import controls which some countries will have to impose for a few years after World War II in order to protect the dependability of currencies and currency relationships. Such exchange and import controls should, in so far as possible, be on a nondiscriminatory basis.

6. Satisfactory commercial relationships between private enterprise and state-controlled monopolies.

Some basis must be found for the establishment of satisfactory relations with state-trading countries, both as to their dealings with each other and with parties in third countries.

Satisfactory relations can only mean those that will promote trade and commerce to the economic advantage of all concerned and in the spirit of fair dealing and good will.

7. The progressive development of the legal rules which affect commerce and travel between nations.

Just as we must have a dependable structure of currencies for an expanding world trade, so, too, we need greater certainty as to the rights and duties of persons and property engaged in international commerce. Universality and uniformity are desirable, but it is more important to have certainty and impartiality.

#### American Aims

In the light of the foregoing prerequisites and with the recognition of America's stake in a healthy economic world, we may state what should be the foremost objectives of American policy.

1. First and foremost is the need for the maintenance of high-level productive employment in the United States. This country can make no greater contribution to high levels of world trade than by developing and maintaining a high level of employment and production at home. In serving ourselves by attaining our own prosperity, we serve all other countries as well. In this connection, it is appropriate to emphasize that there is no necessary conflict between social reform and internationalism.

Admittedly, the level of employment in the United States is not primarily dependent on international trade. Full employment could still be attained without foreign, trade, but the result would entail great readjustment, much inefficient production, and a lower standard of living. Exports help, not so much to maintain high-level domestic employment as to increase living standards. This improvement is made by the exchange of goods and services in which we are more efficient

producers for foreign goods and services in the production of which we would be less efficient producers.

- 2. The United States should reduce, and eliminate where practicable, artificial barriers to world trade. We should take the lead in such a program, by placing maximum stress on the need to broaden trade on a multilateral basis. To this end, the tariff should be lowered by way of the Trade Agreements program, at least for the time being, and in some instances through the unilateral reduction of rates of duty. The most desirable means, however, would be to reduce duties on a multilateral basis by means of an international trade convention or a series of such conventions.
- 3. International cartels, as opposed to international commodity agreements in which the consumer interest is substantially represented, should be curbed to the extent necessary to eliminate the monopolistic and restrictive practices in which they engage. Cartels should definitely be under public scrutiny. With respect to commodity agreements, the consumer interest should be defended no less strongly than the producer interest, except in so far as modifications are required to protect the smaller raw-material countries (as distinct from the absentee owners).
- 4. The use of export subsidies should in general be avoided. A creditor country should never use subsidies as a means of acquiring foreign business as such or for the purpose of curtailing foreign competition. Subsidies are a proper instrument of public policy only when used to promote national security, narrowly defined. One of the few outstanding cases is the subsidization of a part of our merchant marine. These subsidies are directed to a specific purpose for which specific performance is required.
- 5. International investment by the United States should not be stimulated as a device to reduce domestic unemployment. Its sole purpose should be to increase productivity abroad, and repayment of individual loan transactions should be expected

in all cases, although American policy should also facilitate repayment of loans through imports. It is desirable that the volume of foreign investment be not exposed to great fluctuations from year to year.

- 6. Lending by the United States should not be on the basis of tied loans, such as characterizes the loan policy of the Export-Import Bank. This institution should neither require that the proceeds of a loan be spent on American goods nor that the goods be shipped in vessels of United States registry, as has been done in some instances.
- 7. The United States should co-operate with other countries through membership in official international organizations dealing with economic and other matters.

## American Responsibilities

Emphasis upon details of analysis may have blurred the clean outlines of some fundamentals. It may be appropriate, therefore, to treat specifically of one or two major American responsibilities in world economic affairs. When there are disturbances to international trade, the ideal situation is to have the adjustment to such disturbances take place in all countries that materially affect or are affected by the disturbances. Two-sided adjustment should be the rule. When. however, an important country is hit by severe economic depression while the rest of the world is reasonably prosperous, the depressed country should not expect the other countries to join her in her suffering. The depressed country should carry most of the burden of adjustment, and the other countries should be allowed to impose temporary restrictions on the exports of the depressed country. Otherwise, the favorable balance of payments of the depressed country will lead to the loss of monetary reserves from other countries. The depressed country will simply have exported some of its unemployment.

As a result of the experience of the interwar period, the world has come to regard fluctuations in the economic activity of the United States as a major source of disturbance. Business depression in this country sharply curtails our imports (other countries' exports), and foreigners have come to feel that they should be permitted to carry out a compensatory policy of placing restrictions on our exports. They should, in fairness, be permitted to do so, provided that it is clearly understood that the restrictions are temporary. In such circumstances. foreigners have the responsibility of seeing to it that restrictions are only short-lived, and the United States has the weighty responsibility of restoring employment and income at home in such a way as not to disturb international specialization in production. In other words, the United States, under the conditions which have been posited, should carry the major burden of adjustment. It does not follow, however, that the United States was to blame for the numerous forms of trade discrimination which were practiced in the 1930's, since other important countries, which were also suffering from underemployment, used discriminatory devices for the objectionable purpose of exporting their own unemployment. and still other countries employed discriminatory trade devices while enjoying substantially full employment.

The United States has the responsibility, not only of helping to stabilize world trade at a high level through high employment at home but also of playing an important role in helping to develop the maximum growth of trade consistent with the advantages of international specialization. High domestic employment and American efforts to expand world trade should go hand in hand, since high levels of domestic activity simplify the problem of transferring resources from line to line within the country, and the ease of resource-transfer, in turn, makes less difficult the task of greatly expanding our imports. The stark fact of the matter is that the outside world looks to the United States to expand its imports, in its own self-interest. We need to expand our imports in the interest of maximizing the productivity of our resources. We need to enlarge our imports in order to lay a solid basis for large-scale foreign lending. so necessary because of our high propensity to save, and so much needed by a world longing for economic development. And we need to expand our imports to facilitate the strengthening and maximum development of a multilateral world trading system. We know from theory and we have learned from painful experience that multilateral trade is the only satisfactory basis for the mutual exchange of goods and services in an interdependent world. When all of these matters are sifted, they amount to the proposition that the United States has the responsibility of making appropriate domestic and international adjustments.

Closely related to the above responsibility with respect to adjustment is the responsibility of the United States to use its world economic position to combat harmful and bullying tacties in international trade. Trade restrictions are broadly speaking of two types, depending upon the presence or absence of discrimination on a country basis. There are the legitimate restrictions, such as result from nonpreferential tariffs2 and variations in the rate of exchange. There are, on the other hand, a variety of restrictions and controls that are in a real sense illegitimate. These illegitimate restrictions are bilateral clearings, special quotas, discriminatory payments agreements, special subsidies, discriminatory tariff arrangements, and so on. Except for their employment during brief intervals, on a purely temporary basis and for the purpose of enabling a country to control its balance of payments to the end that deflation be avoided, these controls are objectionable. They are objectionable primarily because of their discriminatory character, but also because they introduce long-term distortions in the structure of international specialization and because such distortions place small countries, faced with limited scope for adaptation, at the mercy of larger countries. The United States, as one of the strong countries, must devote its efforts unceasingly to the eradication of the illegitimate restrictions

<sup>&</sup>quot;Nonpreferential tariffs as a type, although a comparatively unobjectionable kind of restriction, are not good devices. The statement in the text is not meant to conflict with the conclusions reached in Chapters 13-19.

upon world trade. Many parts of the world have only the United States to look to in connection with the problem.

In connection with the discharge of American responsibilities, students of the problem will have to recognize that action in the international field, as in all other fields, will not meet with the approval of all sections of the country at all times. The nation will have to suffer some losses and sacrifices in exchange for national and international benefits; some groups in our economy will be disappointed so that others may be assisted. If we are to have a satisfactory international economic system, it cannot be otherwise. The predominant national interest must prevail at all times. If it fails to prevail, it will be not because we lack the necessary body of principles, but because special groups will insist upon pressing their interests to the exclusion of the broad national and international interest.

## Appendix A

## Commodity-Reserve Money

Most students of world economic problems would probably agree that a desirable international monetary standard should (1) facilitate the attainment of full employment and (2) operate so as to maintain a substantially stable price level. A most promising device for attaining this twofold objective is what is known as commodity-reserve money. It will be remembered that the gold standard provides a unique correlation between gold and money, or in other words, that there is an unlimited demand for gold at a fixed price under such a monetary standard. (Commodity-reserve money borrows a leaf from the gold-standard book by establishing a unique correlation between goods and money in the form of an unlimited demand for a broad group of commodities at a fixed price for the group as a whole. Such unlimited demand for a wide variety of goods in turn is supposed to assure a high degree of general price stability.) This appendix endeavors to show how commodity-reserve money may provide the cornerstone of a system designed to insure substantially full employment and a stable general price level. We present the scheme as an interesting idea, rather than one on which there is a consensus among economists.

## Character of Standard

1. Definition of Currency. The commodity-reserve standard may perhaps best be described by comparing and contrasting

<sup>&</sup>lt;sup>1</sup>This appendix draws heavily upon Graham, F. D., Social Goals and Economic Institutions, Chapter 5, 1943, by permission of the Princeton University Press.

it with the gold standard. Currency under the gold standard is issued against, and redeemable in, a fixed weight of gold of a given fineness. For example, the pre-1933 dollar was defined as 25.8 grains of gold nine-tenths fine. Paper dollars and gold were interchangeable at the defined value of the dollar. Under the commodity-reserve standard, currency is issued against. secured by, and redeemable in a broad group of basic storable (nonperishable) commodities in general use. The composite group of specified commodities is thus accorded precisely the same monetary treatment as was formerly accorded to gold alone. The composite-reserve commodities should consist of as broad a group as possible. In a country such as the United States, the group would consist of the following, among others: wheat, cotton, tobacco, sugar, coffee, cocoa, alcohols, caustic soda, soda ash, sulphuric acid, coal-tar distillates, resins, glass, cotton grey cloth, hides, sawed lumber, crude petroleum, cement, coal, pig iron, tin plate, steel plates, copper, lead, zinc, tin, aluminum, and gold. These commodities would not be included in the composite in equal physical amounts. Rather. the relative amounts of the different goods would be determined by their relative importance in trade: crude petroleum would be weighted more heavily than hides; cotton more heavily than gold; and so on. Once the relative amounts of the different commodities in the unit had been determined, they would be subject to change only at infrequent intervals, let us say once a decade, in line with shifts in the relative commercial importance of the goods making up the unit. This composite or commodity unit would be quite valuable: it might bear roughly the same relation to a dollar bill as does a bar of gold today. Therefore, the dollar might be defined by Congress as equal to 1/10,000 of a commodity unit if the group of commodities in the unit were found to be valued at average market prices during a preceding period of years at, let us say, \$10,000.00.

2. The Mechanics of Currency Issue and Redemption. New, legal-tender currency would be issued against the deposit with the Treasury of warehouse receipts evidencing the existence of one or more complete commodity units. The new currency would be backed 100 per cent. Persons possessing currency and wanting commodities would deposit currency with the Treasury against the latter's surrender of warehouse receipts. The procedure would exactly parallel the former practice in which anyone could deposit or withdraw gold in exchange for currency. Commodity-reserve dollars would thus be warehouse certificates, analogous to the gold certificates now held by the Federal Reserve Banks (evidencing the deposit of a fixed amount of gold with the Treasury). The Treasury might wish to charge a commission of about one per cent on issues of currency in order to defray the expenses of storing commodities.

3. Operation of the Commodity-Reserve System. Suppose that the market prices of the commodities making up the commodity unit should fall so that the aggregate market price of the group fell below the reserve value. If this were to happen, anyone would be able to buy the goods on the market, deliver to the Treasury the warehouse receipts covering these goods, and receive the reserve value in currency. By this means, it would be virtually impossible for the price of reserve commodities, considered as a group, to fall below their reserve value, because the market price for them would be powerfully supported for two reasons: goods would be taken off the market, at least temporarily, and there would be an increase in the supply of money (as a result of the conversion of goods into money by the delivery of warehouse receipts to the Treasury in exchange for currency).

If, on the other hand, the reverse situation should occurthat is, if the sum of market prices of the commodities in the unit should rise above the reserve or redemption value, anyone could withdraw commodity units from the Treasury at currency value (par), sell the commodities on the market, and pocket a profit. In consequence, the additional goods would be thrown on the market, and there would be a decline in the supply of money to the extent that currency was redeemed at the Treasury in commodity units.

What are the limits of fluctuation of the aggregate market price of the commodity unit? The sum of market prices of goods in the unit should fluctuate above and below the reserve value (par) by not more than the storage charges and other costs imposed by the Treasury on individuals making deposits to or withdrawals from the reserve. Under the gold standard. the cost of moving gold from country to country is the chief determinant of the limits (gold points) within which the exchange rate may fluctuate before corrective gold movements are brought into operation. Similarly, under a commodityreserve standard, the charges and costs payable by those making deposits to or withdrawals from the reserve would set the limits above and below the reserve value within which the aggregate market price of the reserve commodities could fluctuate. Such limits would probably be of the order of one per cent of the reserve value. To all intents and purposes, price movements would be so small as to be insignificant.

4. Reserve-Commodity Prices and the General Price Level. The commodity-reserve standard calls for fixing the aggregate price of the goods in the commodity unit. The prices of individual commodities in the unit would not be fixed, however, but would be free to fluctuate in accordance with the underlying conditions of supply and demand, as has always been the case. There would be no attempt to support the market for surpluses of specific commodities. Since the reserve will accept commodities only as a group, in fixed relative amounts, it follows that goods relatively oversupplied in the market will fall in price. The other reserve goods will be relatively undersupplied, with the result that their prices will automatically rise. Thus, a reduction in the market price of goods in relative oversupply will bring about a reduction in their production, and a compensating increase in the market price of goods in relative undersupply will serve to bring about an increase in their production.

The commodity-reserve standard will, therefore, constitute a mechanism for apportioning resources in accordance with the relative demand for goods in the commodity unit. And it will do so while maintaining substantially stable prices. Moreover, unlike the price reaction to production adjustments under traditional monetary standards, in which, because of the character of the market, relatively undersupplied commodities typically suffered pricewise in the same direction as commodities in relative oversupply, the commodity-reserve standard affords producers whose goods are in relative oversupply a favorable opportunity to transfer resources to lines where prices have actually increased. In many instances, this will mean only a shift of emphasis within a given industrial plant or farming enterprise, to the production of more of one good and of less of another. The effect of this monetary system would be to prevent a cumulative worsening of the situation. and to substitute therefor a price environment in which there would be no tendency toward a prolongation of maladjustments. The advantages of such an arrangement to the economy as a whole are obvious.

The virtues of commodity-reserve money are nowhere better illustrated than with respect to the manner in which the community's desire for liquidity is satisfied. Under traditional monetary standards, the rate of flow of money against goods and services is retarded whenever there is an increase in the preference for holding cash. This retardation in the money flow reduces incomes, restricts consumer demand, lessens general economic activity, and typically leads to underemployment of resources. Under a commodity-reserve system, however, any funds made available to those with a thirst for liquid assets would be exactly offset by new money issued in exchange for goods delivered to the reserve. The production of goods outside of the reserve might be adversely affected temporarily, but the total market for goods would always expand step by step with the total supply of goods. This means that there would be shifts in the composition of the community's output,

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but not if the money value of a typical unit of output. More important still, commodity-reserve money would eliminate the chief causes of a passion for liquidity—the lack of markets and the fear of falling prices. Holders of money traditionally have expected to obtain a return on their resources. Since they would get no return under stable prices, hoarders would be penalized to the extent that they incurred costs in holding resources idle.

5. Possible Dangers to Working of Commodity-Reserve Money. There are two general dangers to which commodity money would be exposed. In the first place, there may be a persistent tendency of money savings to outrun investment. even though general profit expectations were stabilized and interest rates were in line with profit rates. In such a case, the volume of goods in the reserve would grow larger and larger. If a development of this sort were to occur, the monetary authorities could rectify the situation by allowing the reserve to fall somewhat below 100 per cent. Unbacked notes might be issued, let us say, in payment for new public-works projects. By this means, the money supply would increase relative to goods until prices rose sufficiently to lead to the delivery of money to the reserve in exchange for commodities. General stability in the price level would be maintained. The device of a fractional reserve, applied temporarily, would be nothing new: our traditional monetary and banking policies operate on such a basis.

The second, and more important, danger probably lies, not in an excessive but in an inadequate reserve. If the monetary authorities disregarded commodity-reserve principles and persisted in the issue of new money without reserve backing, there would be an inevitable orgy of inflation because, given the full-employment conditions that would prevail under the commodity-reserve standard, any unbacked money would upset the pre-existing balance between goods (plus services) and money, and let loose the forces making for a sustained rise of prices. Since co odities would be available from the reserve

at par, the reserves would soon be drained off completely for sale in the market at arbitrarily inflated prices. Once the reserves had disappeared, there would be no automatic check on inflation. Only a new set of government controls could stop the inflation, but by the time the situation was brought under control, the cost structure would be so far out of line with the pre-inflation one that a return to commodity-reserve money would involve a drastic change in the composition of the commodity unit. Such an inflation could result only from the sabotage of commodity-reserve principles, perhaps at the instigation of powerful pressure groups. Just as eternal vigilance is the price of political freedom, so great vigilance will be required if freedom from inflation is to be maintained under commodity-reserve money.

6. The Transition to Commodity-Reserve Money at Home. As far as concerns the introduction of commodity-reserve money in the United States, it will not be necessary to disturb the existing money supply (including bank deposits). After a warehouse-receipt currency has been established, it will only be necessary to confine all new issues of currency to commodity money, with the expansion of the banks' demand deposits similarly being permitted only against a 100 per cent reserve.

Professor Graham has suggested a program for the introduction of commodity-reserve money in the United States along the following lines:

- a. Commodity-reserve money shall be initiated on the appearance of a fall in the price level of basic commodities below a designated figure.
- b. All commercial banks shall, as of that date or earlier, be required to join the Federal Reserve System.
- c. The Board of Governors of the Federal Reserve System shall be given power to fix at its discretion the reserve ratios required of member banks (the present proportions among the reserves required of central reserve city, reserve city, and country banks may be maintained).
  - d. All member banks shall be required to redeem their cur-

rent deposit liabilities, on demand, in cash or in checks against their reserve balances at the option of the holder.

- e. The Federal Reserve Banks shall be directed freely to buy, at the prescribed dollar value, warehouse receipts representing composite-commodity units and to pay therefor in Reserve Bank deposits transferable only to a member bank.
- f. After a stated reserve of these receipts is acquired by the Reserve Banks as a whole, each of the Reserve Banks shall be required to redeem its liabilities, on demand, in commodity units or gold at the option of the holder.
- g. A progressive tax shall thereafter be imposed on the Reserve Banks as a whole whenever the total of their commodity reserves falls below the stated figure. (Distribution of the tax as among the several banks should be in inverse proportion to the ratio of their commodity reserves to their demand liabilities, and rediscounting, by any one of the Reserve Banks for another, should be subject, as at present, to the dictate of the Board.)

## An International Commodity-Reserve System

Any single country, such as the United States, could establish a commodity-reserve system independently of the rest of the world if it so desired. This would be especially true if gold were treated about the same as it has been traditionallythat is, if there were no restrictions on the movement of gold and if it could be purchased in unlimited amounts at a fixed price. (Money in the United States could freely be redeemed in gold, since no private hoarding of the metal, or any other type of money, could lower the price level of goods in the reserve. In fact, pressure on the price of gold resulting from the action of hoarders would lead to an automatic expansion of commodity reserves to offset any reduction in gold reserves traceable to the redemption of currency in the metal. Thus. if gold were demanded at a time when it was thought that depression was impending the sale of commodity units to the reserve would provide a self-liquidating type of support for general business activity. At the other extreme, bank-credit expansion on the basis of deposited gold reserves would be checked before it reached inflationary proportions by the simple process of holders of money redeeming currency in commodity units to the extent necessary to maintain stable prices.)

The shift by the United States from its present monetary arrangements to a commodity-reserve basis would not necessarily involve any change in the exchange rate or in the operation of the exchange market. When the other major countries also adopt a similar commodity-reserve money, the only thing that would be changed is the relationship between money, prices, and domestic economic activity in each country. By adhering to commodity-reserve money, other countries would also possess a monetary mechanism favorable to full employment and stable prices. International exchange-rate relationships would continue, as before, to be determined proximately by payment-receipt relations as summarized in the balance of payments, and fundamentally by the relative national efficiency of producing goods and services under ever-changing conditions of international demand.

The adoption of the commodity-reserve standard, moreover, would powerfully affect international economic relations. First and foremost, the unlimited demand for reserve commodities under the system coupled with the stabilizing effect of such an arrangement upon the demand for goods outside the reserve, would permit a freer and more productive international division of labor by virtue of the fact that domestic producers would be inclined to take a basically tolerant attitude toward imports. Domestic producers, instead of regarding imports as crowding them out of their own market, would have assured alternative outlets for their talents and resources. Such prospects would serve to place the emphasis where it should be: upon socially desirable adjustments in production based on relative efficiency.

In the second place, periodic difficulties in effecting international payments on old debts, reparations, and so on would

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virtually disappear. The old transfer problem (payment of reparations, servicing of debts, and so on) would no longer be a purely financial one. It would, moreover, be unnecessary to make international gifts under the subterfuge of loans, as was the case with the loans to Germany in the 1920's and the Inter-Ally war loans.

Thirdly, an international commodity-reserve system would do away with the harmful practice of competitive currency depreciation. Fully developed, such an international monetary system would have fixed exchange rates of all member currencies against the international commodity standard. Since each currency would be fixed against the standard, the national currencies would stand in a fixed relation to one another. Each country would offer freely to exchange its currency against warehouse receipts covering the commodity composite, and vice versa. Any country would enjoy a substantially stable price level simply by adhering to the system, and it would have an assured foreign-market outlet for the group of those goods in the composite unit which it produced for export.

In other words, there would be two fundamental reasons why countries adhering to an international commodity-reserve system would not indulge in competitive currency depreciation. The first reason is that the operation of the system would tend to effect production adjustments on a world-wide basis, facilitating the allocation of resources to accord more closely than heretofore with conditions of demand. There need be, in consequence, little or no reliance on separate national efforts to dispose of surpluses by the high-pressure method of competitive currency depreciation. The second and more important reason is that nations would be foolish to dispose of export products on terms inferior to those already available for the total of their exportable surplus. Yet that is what they would be doing if they depreciated their currency.

In the fourth place, international adherence to a commodity-

reserve standard would serve to distribute national economic power more nearly in proportion to the international distribution of developed and potential resources. Power traceable to imperial connections, in particular, would tend to decline at an accelerated rate because colonial and subject countries would have less need than heretofore to be dependent upon markets in, and investments by, the centers of empire.

As a stabilizing factor, however, an international commodity-reserve standard would operate with varying potency as between countries, particularly as between large, well-balanced national economies and small, one- or two-commodity (export) economies. In the case of economies such as the United States or the Soviet Union, the diversity of natural resources together with a varied industrial development, in conjunction with a monetary system assuring a fixed aggregate price and unlimited demand for the composite-commodity unit, would permit a relatively easy transfer of resources with comparatively little loss of efficiency from commodity to commodity within the composite. Assured demand at stable prices would be easily realizable, barring antisocial behavior on the part of special pressure groups. Commodities in the composite which may become relatively oversupplied would suffer a loss of resources devoted to their production, with a compensating increase occurring in the production of goods relatively undersupplied.

But in the case of small, one- or two-commodity economies (for example, El Salvador's coffee economy or Denmark's dairy and livestock economy), the assurance of an unlimited demand at stable prices for a broad composite of goods would mean something quite different. A one-sided economy would, in effect, remain exposed, as has been the case up to the present, to greater economic fluctuations than the more balanced national economies. If the one or two commodities on which it relies, and which are included in the composite-commodity unit, become relatively oversupplied internationally, it would have no alternative but to suffer a decline in its terms of trade

and income, at least temporarily. The fact, however, that such economies would be relatively less secure than the more balanced economies does not mean that they would have nothing to gain from adhering to an international commodity-reserve standard. The very stability which that standard would do much to promote in the major economies would, in turn, insure a degree of stability of demand for the export commodities of the small and one-sided economies.

The standard would, in fact, do more than that. It would tend to dampen fluctuations in the small economy by virtue of the way in which it would expedite the adjustment of world supply, commodity by commodity, to world demand. And to that extent, ups and downs in the small countries would be both smaller in amplitude and of shorter duration than heretofore. It follows, therefore, that the highly specialized small economy would still have much to gain from adherence to, or from the existence of, an international commodity-reserve standard, even though such a monetary system remains relatively more attractive to national economies well balanced in terms of natural and man-made resources.

Moreover, the small economies would be granted a measure of independence from the pressure frequently exerted upon them by a few large industrial countries that employ their import bargaining power in a semimonopsonistic manner. The small Balkan countries would be less likely to have to succumb to pressure from Germany, and countries such as Denmark and Argentina would be relatively free from arbitrary pressure to divert their purchases to Great Britain.

Before bringing this appendix to a close, a word should be said about a basic criticism of international commodity-reserve money. It is feared by some that price stability under conditions of full employment would be next to impossible, since full-employment conditions are bound to lead to a progressive rise of wages relative to labor efficiency. In these circum-

<sup>&</sup>lt;sup>2</sup> Keynes, J. M., Economic Journal, pp. 185-187, June-September 1943. But see Graham, F. D., Economic Journal, pp. 422-429, December 1944.

stances an international standard with fixed exchange rates, whether that standard be the old gold standard or commodity-reserve money, would break down. It would suffer such a fate, according to this view, because modern states no longer allow the level of internal prices to be dictated by the outside world or by an international monetary standard. If internal prices must rise to accommodate increases in wages, the exchange rate should be allowed to adjust itself to internal prices. It is claimed that commodity-reserve money on a fixed-exchange-rate basis would in effect involve the same type of rigidity as obtained under the old gold standard.

The logic of this position is unexceptionable, but how does the view accord with the facts? Is there any reason to feel that wage rates must rise faster than increases in labor efficiency? The fact of the case, at least in the United States. is that the historical upward trend in money wages has not been accompanied by any tendency for unit costs to rise Money wage rates can rise steadily without increasing the level of prices if there is a corresponding increase in efficiency. In fact, modern industrial economies function smoothly only if wage changes reflect changes in the efficiency of production. The fear above referred to, therefore, reduces itself to a fear that labor unions will insist, under conditions of full employment, upon upward wage adjustments when there is no corresponding rise in labor efficiency. It seems unduly pessimistic to assume that union leadership will show such limited intelligence.

Despite the fact that commodity-reserve money parallels traditional monetary mechanisms in a functional sense, the idea of reserve money has not yet received the acceptance of governments. In part, this may be explained by the half-hearted way in which the democratic nations met the underemployment problem before World War II. Even more, it is explainable in terms of the vested interest in gold of the gold-producing nations and empires, and of the nations that are

prodigious hoarders of the yellow metal. The result has been that nations have had recourse to a variety of expedients. The proponents of commodity money believe that the surrender to expediency in the field of international monetary affairs would be more difficult if a wide audience were familiar with the principles of commodity-reserve money.

## Appendix B

# Excerpts from Articles of Agreement of the International Monetary Fund

## Article I. Purposes

The purposes of the International Monetary Fund are:

- (i) To promote international monetary co-operation through a permanent institution which provides the machinery for consultation and collaboration on international monetary problems.
- (ii) To facilitate the expansion and balanced growth of international trade, and to contribute thereby to the promotion and maintenance of high levels of employment and real income and to the development of the productive resources of all members as primary objectives of economic policy.
- (iii) To promote exchange stability, to maintain orderly exchange arrangements among members, and to avoid competitive exchange depreciation.
- (iv) To assist in the establishment of a multilateral system of payments in respect of current transactions between members and in the elimination of foreign-exchange restrictions which hamper the growth of world trade.
- (v) To give confidence to members by making the Fund's resources available to them under adequate safeguards, thus providing them with opportunity to correct maladjustments in their balance of pay-

- ments without resorting to measures destructive of national or international prosperity.
- (vi) In accordance with the above, to shorten the duration and lessen the degree of disequilibrium in the international balances of payments of members.

The Fund shall be guided in all its decisions by the purposes set forth in this Article.

## Article III. Ouotas and Subscriptions

- Sec. 1. Quotas. Each member shall be assigned a quota.
- Sec. 2. Adjustment of quotas. The Fund shall at intervals of five years review, and if it deems it appropriate propose an adjustment of, the quotas of the members. It may also, if it thinks fit, consider at any other time the adjustment of any particular quota at the request of the member concerned. A four-fifths majority of the total voting power shall be required for any change in quotas, and no quota shall be changed without the consent of the member concerned.
- Sec. 3. Subscriptions. (a) The subscription of each member shall be equal to its quota.
  - (b) Each member shall pay in gold, as a minimum, the smaller of
    - (i) twenty-five per cent of its quota; or
    - (ii) ten per cent of its net official holdings of gold and United States dollars as at the date when the Fund notifies members . . . that it will shortly be in a position to begin exchange transactions.
  - (c) Each member shall pay the balance of its quota in its own currency.
- Sec. 4. Payments when quotas are changed. Each member which consents to an increase in its quota shall, within thirty days after the date of its consent, pay to the Fund twenty-five per cent of the increase in gold and the balance in its own cur-

rency. If, however, on the date when the member consents to an increase, its monetary reserves are less than its new quota, the Fund may reduce the proportion of the increase to be paid in gold.

## Article IV. Par Values of Currencies

- Sec. 1. Expression of par values. (a) The par value of the currency of each member shall be expressed in terms of gold as a common denominator or in terms of the United States dollar of the weight and fineness in effect on July 1, 1944.
- Sec. 2. Gold purchases based on par values. The Fund shall prescribe a margin above and below par value for transactions in gold by members, and no member shall buy gold at a price above par value plus the prescribed margin, or sell gold at a price below par value minus the prescribed margin.
- Sec. 3. Foreign-exchange dealings based on parity. The maximum and the minimum rates for exchange transactions between the currencies of members taking place within their territories shall not differ from parity
  - (i) in the case of spot exchange transactions, by more than one per cent; and
  - (ii) in the case of other exchange transactions, by a margin which exceeds the margin for spot exchange transactions by more than the Fund considers reasonable.
- Sec. 4. Obligations regarding exchange stability. (a) Each member undertakes to collaborate with the Fund to promote exchange stability, to maintain orderly exchange arrangements with other members, and to avoid competitive exchange alterations.
- (b) Each member undertakes, through appropriate measures consistent with this Agreement, to permit within its territories exchange transactions between its currency and the noise of other members only within the limits prescribed

under Section 3 of this Article. A member whose monetary authorities, for the settlement of international transactions, in fact freely buy and sell gold within the limits prescribed by the Fund under Section 2 of this Article shall be deemed to be fulfilling this undertaking.

- Sec. 5. Changes in par values. (a) A member shall not propose a change in the par value of its currency except to correct a fundamental disequilibrium.
- (b) A change in the par value of a member's currency may be made only on the proposal of the member and only after consultation with the Fund.
- (c) When a change is proposed, the Fund shall first take into account the changes, if any, which have already taken place in the initial par value of the member's currency as determined under Article XX, Section 4. If the proposed change, together with all previous changes, whether increases or decreases,
  - (i) does not exceed ten per cent of the initial par value, the Fund shall raise no objection;
  - (ii) does not exceed a further ten per cent of the initial par value, the Fund may either concur or object, but shall declare its attitude within seventy-two hours if the member so requests;
  - (iii) is not within (i) or (ii) above, the Fund may either concur or object, but shall be entitled to a longer period in which to declare its attitude.
- (d) Uniform changes in par values made under Section 7 of this Article shall not be taken into account in determining whether a proposed change falls within (i), (ii), or (iii) of (c) above.
- (e) A member may change the par value of its currency without the concurrence of the Fund if the change does not affect the international transactions of members of the Fund.
  - (f) The Fund shall concur in a proposed change which is

within the terms of (c) (ii) or (c) (iii) above if it is satisfied that the change is necessary to correct a fundamental disequilibrium. In particular, provided it is so satisfied, it shall not object to a proposed change because of the domestic social or political policies of the member proposing the change.

- Sec. 6. Effect of unauthorized changes. If a member changes the par value of its currency despite the objection of the Fund, in cases where the Fund is entitled to object, the member shall be ineligible to use the resources of the Fund unless the Fund otherwise determines; and if, after the expiration of a reasonable period, the difference between the member and the Fund continues, the matter shall be subject to the provisions of Article XV, Section 2 (b).
- Sec. 7. Uniform changes in par values. Notwithstanding the provisions of Section 5 (b) of this Article, the Fund by a majority of the total voting power may make uniform proportionate changes in the par values of the currencies of all members, provided each such change is approved by every member which has ten per cent dr more of the total of the quotas. The par value of a member's currency shall, however, not be changed under this provision if, within seventy-two hours of the Fund's action, the member informs the Fund that it does not wish the par value of its currency to be changed by such action.
- Sec. 8. Maintenance of gold value of the Fund's assets.
  (a) The gold value of the Fund's assets shall be maintained notwithstanding changes in the par or foreign-exchange value of the currency of any member.
- (b) Whenever (i) the par value of a member's currency is reduced, or (ii) the foreign-exchange value of a member's currency has, in the opinion of the Fund, depreciated to a significant extent within that member's territories, the member shall pay to the Fund within a reasonable time an amount of its own currency equal to the reduction in the gold value of its currency held by the Fund.
  - (c) Whenever the par value of a member's currency is

- increased, the Fund shall return to such member within a reasonable time an amount in its currency equal to the increase in the gold value of its currency held by the Fund.
- (d) The provisions of this Section shall apply to a uniform proportionate change in the par values of the currencies of all members, unless at the time when such a change is proposed the Fund decides otherwise.
- Sec. 9. Separate currencies within a member's territories. A member proposing a change in the par value of its currency shall be deemed, unless it declares otherwise, to be proposing a corresponding change in the par value of the separate currencies of all territories in respect of which it has accepted this Agreement. . . . It shall, however, be open to a member to declare that its proposal relates either to the metropolitan currency alone, or only to one or more specified separate currencies, or to the metropolitan currency and one or more specified separate currencies.

## Article V. Transactions with the Kund

- Sec. 1. Agencies dealing with the Fund. Each member shall deal with the Fund only through its Treasury, central bank, stabilization fund, or other similar fiscal agency, and the Fund shall deal only with or through the same agencies.
- Sec. 2. Limitations on the Fund's operations. Except as otherwise provided in this Agreement, operations on the account of the Fund shall be limited to transactions for the purpose of supplying a member, on the initiative of such member, with the currency of another member in exchange for gold or for the currency of the member desiring to make the purchase.
- Sec. 3. Conditions governing use of the Fund's resources.
  (a) A member shall be entitled to buy the currency of another member from the Fund in exchange for its own currency subject to the following conditions:
  - The member desiring to purchase the currency represents that it is presently needed for making

in that currency payments which are consistent with the provisions of this Agreement:

- (ii) The Fund has not given notice under Article VII, Section 3, that its holdings of the currency desired have become scarce;
- (iii) The proposed purchase would not cause the Fund's holdings of the purchasing member's currency to increase by more than twenty-five per cent of its quota during the period of twelve months ending on the date of the purchase nor to exceed two hundred per cent of its quota, but the twenty-fiveper-cent limitation shall apply only to the extent that the Fund's holdings of the member's currency have been brought above seventy-five per cent of its quota if they had been below that amount;
- (iv) The Fund has not previously declared under Section 5 of this Article, Article IV, Section 6, Article VI, Section 1, or Article XV, Section 2 (a), that the member desiring to purchase is ineligible to use the resources of the Fund.

(b) A member shall not be entitled without the permission of the Fund to use the Fund's resources to acquire currency to hold against forward exchange transactions.

Sec. 4. Waiver of conditions. The Fund may in its discretion, and on terms which safeguard its interests, waive any of the conditions prescribed in Section 3 (a) of this Article, especially in the case of members with a record of avoiding large or continuous use of the Fund's resources. In making a waiver, it shall take into consideration periodic or exceptional requirements of the member requesting the waiver. The Fund shall also take into consideration a member's willingness to pledge as collateral security gold, silver, securities, or other acceptable assets having a value sufficient in the opinion of the Fund to protect its interests, and may require as a condition of waiver the pledge of such collateral security.

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- Sec. 5. Ineligibility to use the Fund's resources. Whenever the Fund is of the opinion that any member is using the resources of the Fund in amanner contrary to the purposes of the Fund, it shall present to the member a report setting forth the views of the Fund and prescribing a suitable time for reply. After presenting such a report to a member, the Fund may limit the use of its resources by the member. If no reply to the report is received from the member within the prescribed time, or if the reply received is unsatisfactory, the Fund may continue to limit the member's use of the Fund's resources or may, after giving reasonable notice to the member, declare it ineligible to use the resources of the Fund.
- Sec. 6. Purchases of currencies from the Fund for gold.

  (a) Any member desiring to obtain, directly or indirectly, the currency of another member for gold shall, provided that it can do so with equal advantage, acquire it by the sale of gold to the Fund.
- (b) Nothing in this Section shall be deemed to preclude any member from selling in any market gold newly produced from mines located within its territories.
- Sec. 7. Repurchase by a member of its currency held by the Fund. (a) A member may repurchase from the Fund and the Fund shall sell for gold any part of the Fund's holdings of its currency in ex of its quota.
- (b) At the end of each financial year of the Fund, a member shall repurchase from the Fund with gold or convertible currencies . . . part of the Fund's holdings of its currency under the following conditions:
  - (i) Each member shall use in repurchases of its own currency from the Fund an amount of its monetary reserves equal in value to one half of any increase that has occurred during the year in the Fund's holdings of its currency plus one half of any increase, or minus one half of any decrease, that has occurred during the year in the member's monetary

reserves. This rule shall not apply when a member's monetary reserves have decreased during the year by more than the Fund's holdings of its currency have increased.

- (ii) If after the repurchase described in (i) above (if required) has been made, a member's holdings of another member's currency (or of gold acquired from that member) are found to have increased by reason of transactions in terms of that currency with other members or persons in their territories, the member whose holdings of such currency (or gold) have thus increased shall use the increase to repurchase its own currency from the Fund.
- (c) None of the adjustments described in (b) above shall be carried to a point at which
  - (i) the member's monetary reserves are below its quota, or
  - (ii) the Fund's holdings of its currency are below seventy-five per cent of its quota, or
  - (iii) the Fund's holdings of any currency required to be used are above seventy-five per cent of the quota of the member concerned.
- Sec. S. Charges. (a) Any member buying the currency of another member from the Fund in exchange for its own currency shall pay a service charge uniform for all members of three-fourths per cent in addition to the parity price. The Fund in its discretion may increase this service charge to not more than one per cent or reduce it to not less than one-half per cent.
- (b) The Fund may levy a reasonable handling charge on any member buying gold from the Fund or selling gold to the Fund.
  - (c) The Fund shall levy charges uniform for all members

which shall be payable by any member on the average daily balances of its currency held by the Fund in excess of its quota. These charges shall be at the following rates:

- (i) On amounts not more than twenty-five per cent in excess of the quota: no charge for the first three months; one-half per cent per annum for the next nine months; and thereafter an increase in the charge of one-half per cent for each subsequent year.
- (ii) On amounts more than twenty-five per cent and not more than fifty per cent in excess of the quota: an additional one-half per cent for the first year; and an additional one-half per cent for each subsequent year.
- (iii) On each additional bracket of twenty-five per cent in excess of the quota: an additional one-half per cent for the first year; and an additional one-half per cent for each subsequent year.
- (d) Whenever the Fund's holdings of a member's currency are such that the charge applicable to any bracket for any period has reached the rate of four per cent per annum, the Fund and the member shall consider means by which the Fund's holdings of the currency can be reduced. Thereafter, the charges shall rise in accordance with the provisions of (c) above until they reach five per cent and failing agreement, the Fund may then impose such charges as it deems appropriate.
- (e) The rates referred to in (c) and (d) above may be changed by a three-fourths' majority of the total voting power.
- (f) All charges shall be paid in gold. If, however, the member's monetary reserves are less than one half of its quota, it shall pay in gold only that proportion of the charges due which such reserves bear to one half of its quota, and shall pay the balance in its own currency.

# Article VI. Capital Transfers

- Sec. 1. Use of the Fund's resources for capital transfers.

  (a) A member may not make net use of the Fund's resources to meet a large or sustained outflow of capital, and the Fund may request a member to exercise controls to prevent such use of the resources of the Fund. If, after receiving such a request. a member fails to exercise appropriate controls, the Fund may declare the member ineligible to use the resources of the Fund.
  - (b) Nothing in this Section shall be deemed
    - to prevent the use of the resources of the Fund for capital transactions of reasonable amount required for the expansion of exports or in the ordinary course of trade, banking, or other business, or
    - (ii) to affect capital movements which are met out of a member's own resources of gold and foreign exchange, but members undertake that such capital movements will be in accordance with the purposes of the Fund.
- Sec. 2. Special provisions for capital transfers. If the Fund's holdings of the currency of a member have remained below seventy-five per cent of its quota for an immediately preceding period of not less than six months, such member, if it has not been declared ineligible to use the resources of the Fund under Section 1 of this Article, Article IV, Section 6, Article V, Section 5, or Article XV, Section 2 (a), shall be entitled, notwithstanding the provisions of Section 1 (a) of this Article, to buy the currency of another member from the Fund with its own currency for any purpose, including capital transfers. Purchases for capital transfers under this Section shall not, however, be permitted if they have the effect of raising the Fund's holdings of the currency of the member desiring to purchase above seventy-five per cent of its quota, or of reducing the Fund's holdings of the currency desired below

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seventy-five per cent of the quota of the member whose currency is desired.

Sec. 3. Controls of capital transfers. Members may exercise such controls as are necessary to regulate international capital movements, but no member may exercise these controls in a manner which will restrict payments for current transactions or which will unduly delay transfers of funds in settlement of commitments, except as provided in Article VII, Section 3 (b), and in Article XIV, Section 2.

#### Article VII. Scarce Currencies

- Sec. 1. General scarcity of currency. If the Fund finds that a general scarcity of a particular currency is developing, the Fund may so inform members and may issue a report setting forth the causes of the scarcity and containing recommendations designed to bring it to an end. A representative of the member whose currency is involved shall participate in the preparation of the report.
- Sec. 2. Measures to replenish the Fund's holdings of scarce currencies. The Fund may, if it deems such action appropriate to replenish its holdings of any member's currency, take either or both of the following steps:
  - (i) Propose to the member that, on terms and conditions agreed between the Fund and the member, the latter lend its currency to the Fund or that, with the approval of the member, the Fund borrow such currency from some other source either 'within or outside the territories of the member, but no member shall be under any obligation to make such loans to the Fund or to approve the borrowing of its currency by the Fund from any other source.
  - Require the member to sell its currency to the Fund for gold.

- Sec. 3. Scarcity of the Fund's holdings. (a) If it becomes evident to the Fund that the demand for a member's currency seriously threatens the Fund's ability to supply that currency, the Fund, whether or not it has issued a report under Section 1 of this Article, shall formally declare such currency scarce and shall thenceforth apportion its existing and accruing supply of the scarce currency with due regard to the relative needs of members, the general international economic situation, and any other pertinent considerations. The Fund shall also issue a report concerning its action.
- (b) A formal declaration under (a) above shall operate as an authorization to any member, after consultation with the Fund, temporarily to impose limitations on the freedom of exchange operations in the scarce currency. Subject to the provisions of Article IV, Sections 3 and 4, the member shall have complete jurisdiction in determining the nature of such limitations, but they shall be no more restrictive than is necessary to limit the demand for the scarce currency to the supply held by, or accruing to, the member in question; and they shall be relaxed and removed as rapidly as conditions permit.
- (c) The authorization under (b) above shall expire whenever the Fund formally declares the currency in question to be no longer scarce.
- Sec. 4. Administration of restrictions. Any member imposing restrictions in respect of the currency of any other member pursuant to the provisions of Section 3 (b) of this Article shall give sympathetic consideration to any representations by the other member regarding the administration of such restrictions.
- Sec. 5. Effect of other international agreements on restrictions. Members agree not to invoke the obligations of any engagements entered into with other members prior to this Agreement in such a manner as will prevent the operation of the provisions of this Article.

### Afticle VIII. General Obligations of Members

- Sec. 1. Introduction. In addition to the obligations assumed under other articles of this Agreement, each member undertakes the obligations set out in this Article.
  - Sec. 2. Avoidance of restrictions on current payments.
- Sec. 3. Avoidance of discriminatory currency practices. No member shall engage in, or permit any of its fiscal agencies referred to in Article V, Section 1, to engage in, any discriminatory currency arrangements or multiple-currency practices except as authorized under this Agreement or approved by the Fund.
- Sec. 4. Convertibility of foreign-held balances. (a) Each member shall buy balances of its currency held by another member if the latter, in requesting the purchase, represents
  - (i) that the balances to be bought have been recently acquired as a result of current transactions; or
  - (ii) that their conversion is needed for making payments for current transactions.

The buying member shall have the option to pay either in the currency of the member making the request or in gold.

- (b) The obligation in (a) above shall not apply
  - (i) when the convertibility of the balances has been restricted consistently with Section 2 of this Article, or Article VI, Section 3; or
  - (ii) when the balances have accumulated as a result of transactions effected before the removal by a member of restrictions maintained or imposed under Article XIV. Section 2: or
  - (iii) when the balances have been acquired contrary to the exchange regulations of the member which is asked to buy them; or
  - (iv) when the currency of the member requesting the

- purchase has been declared scarce under Article VII, Section 3 (a); or
- (v) when the member requested to make the purchase is for any reason not entitled to buy currencies of other members from the Fund for its own currency.
- Sec. 5. Furnishing of information. (a) The Fund may require members to furnish it with such information as it deems necessary for its operations, including, as the minimum necessary for the effective discharge of the Fund's duties, national data on the following matters:
  - (i) Official holdings at home and abroad, of (1) gold,(2) foreign exchange.
  - (ii) Holdings at home and abroad by banking and financial agencies, other than official agencies, of (1) gold, (2) foreign exchange.
  - (iii) Production of gold.
  - (iv) Gold exports and imports according to countries of destination and origin.
  - (v) Total exports and imports of merchandise, in terms of local currency values, according to countries of destination and origin.
  - (vi) International balance of payments, including (1) trade in goods and services, (2) gold transactions,
     (3) known capital transactions, and (4) other items.
  - (vii) International investment position—that is, investments within the territories of the member owned abroad and investments abroad owned by persons in its territories as far as it is possible to furnish this information.
  - (viii) National income.
    - (ix) Price indexes—that is, indexes of commodity prices in wholesale and retail markets and of export and import prices.

- · (x) Buying and selling rates for foreign currencies.
- (xi) Exchange controls—that is, a comprehensive statement of exchange controls in effect at the time of assuming membership in the Fund and details of subsequent changes as they occur.
- (xii) Where official clearing arrangements exist, details of amounts awaiting clearance in respect of commercial and financial transactions, and of the length of time during which such arrears have been outstanding.
- (b) In requesting information the Fund shall take into consideration the varying ability of members to furnish the data requested. Members shall be under no obligation to furnish information in such detail that the affairs of individuals or corporations are disclosed. Members undertake, however, to furnish the desired information in as detailed and accurate a manner as is practicable, and, as far as possible, to avoid mere estimates.
- (c) The Fund may arrange to obtain further information by agreement with members. It shall act as a center for the collection and exchange of information on monetary and financial problems, thus facilitating the preparation of studies designed to assist members in developing policies which further the purposes of the Fund.

### Article XI. Relations with Nonmember Countries

- Sec. 1. Undertakings regarding relations with nonmember countries. Each member undertakes:
  - (i) Not to engage in, nor to permit any of its fiscal agencies referred to in Article V, Section 1, to engage in, any transactions with a nonmember or with persons in a nonmember's territories which wouldbe contrary to the provisions of this Agreement or the purposes of the Fund.

# Article XII. Organization and Management

- Sec. 3. Executive Directors. (a) The Executive Directors shall be responsible for the conduct of the general operations of the Fund, and for this purpose shall exercise all the powers delegated to them by the Board of Governors.
- (b) There shall be not less than twelve directors who need not be governors, and of whom
  - (i) five shall be appointed by the five members having the largest quotas;
  - (ii) not more than two shall be appointed when the provisions of (c) below apply;
  - (iii) five shall be elected by the members not entitled to appoint directors, other than the American Republics; and
  - (iv) two shall be elected by the American Republics not entitled to appoint directors.
- (c) Each appointed director shall be entitled to cast the number of votes allotted under Section 5 of this Article to the member appointing him. Each elected director shall be entitled to cast the number of votes which counted towards his election.
- Sec. 5. Voting. (a) Each member shall have two hundred fifty votes plus one additional vote for each part of its quota equivalent to one hundred thousand United States dollars.
- (b) Whenever voting is required under Article V, Section 4 or 5, each member shall have the number of votes to which it is entitled under (a) above, adjusted
  - (i) by the addition of one vote for the equivalent of each four hundred thousand United States dollars of net sales of its currency up to the date when the vote is taken, or
  - (ii) by the subtraction of one vote for the equivalent of each four hundred thousand United States dollars

- of its net purchases of the currencies of other members up to the date when the vote is taken; provided, that neither net purchases nor net sales shall be deemed at any time to exceed an amount equal to the quota of the member involved.
- (c) For the purpose of all computations under this Section, United States dollars shall be deemed to be of the weight and fineness in effect on July 1, 1944, adjusted for any uniform change under Article IV, Section 7, if a waiver is made under Section 8 (d) of that Article.
- (d) Except as otherwise specifically provided, all decisions of the Fund shall be made by a majority of the votes cast.

#### Article XIV. Transitional Period

- Sec. 1. Introduction. The Fund is not intended to provide facilities for relief or reconstruction or to deal with international indebtedness arising out of the war.
- Sec. 2. Exchange restrictions. In the postwar transitional period members may, notwithstanding the provisions of any other articles of this Agreement, maintain and adapt to changing circumstances (and, in the case of members whose territories have been occupied by the enemy, introduce where necessary) restrictions on payments and transfers for current international transactions. Members shall, however, have continuous regard in their foreign-exchange policies to the purposes of the Fund; and, as soon as conditions permit, they shall take all possible measures to develop such commercial and financial arrangements with other members as will facilitate international payments and the maintenance of exchange stability. In particular, members shall withdraw restrictions maintained or imposed under this Section as soon as they are satisfied that they will be able, in the absence of such restrictions, to settle their balance of payments in a manner which will not unduly encumber their access to the resources of the Fund.

Sec. 5. Nature of transitional period. In its relations with members, the Fund shall recognize that the postwar transitional period will be one of change and adjustment and in making decisions on requests occasioned thereby which are presented by any member it shall give the member the benefit of any reasonable doubt.

# Article XV. Withdrawal from Membership

- Sec. 1. Right of members to withdraw. Any member may withdraw from the Fund at any time by transmitting a notice in writing to the Fund at its principal office. Withdrawal shall become effective on the date such notice is received.
- Sec. 2. Compulsory withdrawal. (a) If a member fails to fulfill any of its obligations under this Agreement, the Fund may declare the member ineligible to use the resources of the Fund. Nothing in this Section shall be deemed to limit the provisions of Article IV, Section 6, Article V, Section 5, or Article VI, Section 1.
- (b) If, after the expiration of a reasonable period the member persists in its failure to fulfill any of its obligations under this Agreement, or a difference between a member and the Fund under Article IV, Section 6, continues, that member may be required to withdraw from membership in the Fund by a decision of the Board of Governors carried by a majority of the governors representing a majority of the total voting power.

## Article XX. Final Provisions

Sec. 4. Initial determination of par values. (a) When the Fund is of the opinion that it will shortly be in a position to begin exchange transactions, it shall so notify the members and shall request each member to communicate within thirty days the par value of its currency based on the rates of exchange prevailing on the sixtieth day before the entry into force of this Agreement.

#### SCHEDULE A

### Quotas (in millions of United States dollars)

Australia	200	India	400
Belgium	225	Iran	25
Bolivia	10	Iraq	8
Brazil	150	Liberia	0.5
Canada	300	Luxembourg	10
Chile	50	Mexico	90
China	550	Netherlands	275
Colombia	50	New Zealand	50
Costa Rica	5	Nicaragua	2
Cuba	50	Norway	50
Czechoslovakia	125	Panama	0.5
Denmark 4.		Paraguay	2
Dominican Republic	5	Peru	25
Ecuador	5	Philippine Commonwealth	15
Egypt	45	Poland	125
El Salvador	2.5	Union of South Africa.	100
Ethiopia	6	Union of Soviet Socialist	100
France	450	Republics1	200
Greece	40	United Kingdom 1	200
Guatemala	5	United States2	750
Haiti	5		15
		Uruguay	
Honduras	2.5 1	Venezuela	15
Iceland	1	Yugoslavia	60

<sup>e</sup> The quota of Denmark shall be determined by the Fund after the Danish Government has declared its readiness to sign this Agreement.

ATHORS' NOTE: The Fund authorities, in October 1946, increased the quota of France to 525 million dollars and that of Paraguay to 3.5 million dollars. At the same time the following countries were admitted to membership in the Fund (their quotas in millions of dollars are indicated in parentheses): Italy (180), Turkey (43), Syria (6.5), and Lebanon (4.5).

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